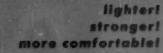
S C H O L A S T I C





Only the finest grades of young, supple kangaroo hides are selected for RIDDELL shoes. Special tanning processes bring out the utmost in these lightweight, durable leathers to stay softer, lighter . . . longer! What's more, the entire upper of RIDDELL kangaroo shoes is made of these top grades of kangaroo leather. Each shoe is skillfully constructed throughout to the high RIDDELL standards of quality to keep players an extra jump ahead of the field.

AND BLUEBACK KANGAROO ARE AVAILABLE FOR FOOTBALL — high and low cut styles; BASEBALL and TRACK!

KANGAROO ATHLETIC SHOES BY



SEE YOUR RIDDELL BEALER OR WRITE FOR PREE LITERATURE

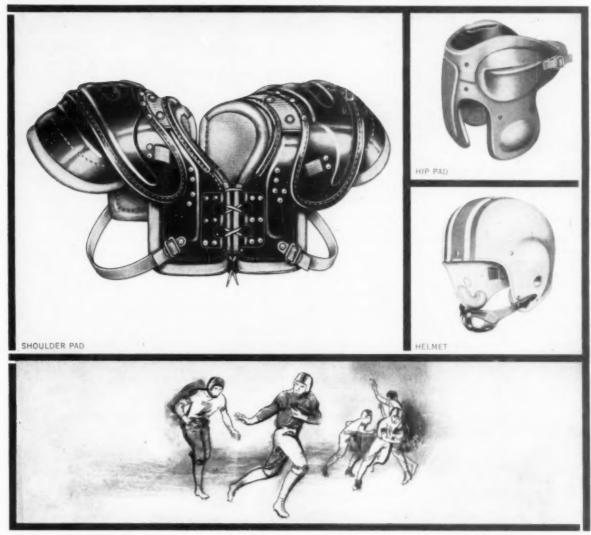
JL 7 RUDDell

1300 north wood street, chicago 22, illinois

pecialists in flagr athletic equipment

The EIDDELL Stray tie leature is petented under U. S. Per. No. 2004200

U.S. ENSOLITE-LINED EQUIPMENT BLOCKS OUT FOOTBALL PUNISHMENT



The finest impact protection you can supply your players is U. S. Ensolite-lined equipment. The closed-cell vinyl sponge structure of U. S. Ensolite positively cushions the impact of hard driving blocks and tackles. In fact, thorough testing by America's finest sporting goods makers has proved that U. S. Ensolite soaks up shock better than any other padding material. U. S. Ensolite provides

protection without bulk or weight. Because it is light, extremely flexible and won't absorb weight-producing moisture, U. S. Ensolite-lined equipment doesn't steal steps from a runner...he's free to use all the speed he has. When you next order equipment, specify U. S. Ensolite-lined equipment to your supplier...there's no better way to keep your squad in top shape...at top speed.



United States Rubber

Mishawaka, Indiana

BUILD A WINNING FOOTBALL TEAM!



With this NEW Maggie Magnetic PORTABLE Coaching Board

Trust the top designer and pioneer maker of magnetic coaching boards to turn up something NEW! It's the Maggie PORTABLE Football Coaching Board with chalkwriting surface. It's a new, revolutionary concept in coaching boards - light, compact . . . easier to use. All the tools needed for effective, rapid demonstration are on magnets and move with fingertip ease. Cuts talk, diagramming and shows strategy better and faster than any other board. See it . . . try it . . . and prove to yourself that Maggie coaching boards may be imitated but never equaled.



Deluxe Portable Football Coaching Kit.

Folds from 24" x 36" to half size. Fits into attractive twill zipper case. Weighs 9 lbs, including case. Special introductory price, complete with carrying case \$32.50.

\$G-40F: Deluxe Football Coaching Kit. Price **\$24.95** (plus shipping).

See your Dealer or write to

maggie magnetic, inc. 39 West 32nd St., New York 1, N. Y.

There is a Maggie Board for Every Major Sport. Write for Free Literature.

SCHOLASTIC

Reg. U. S. Pat. Off.

VOLUME 28 • NUMBER 1 • SEPTEMBER 1958

IN THIS ISSUE

HERE BELOW (Prophet Side of the Ledger)	5
OHIO STATE'S THREE-DEEP PASS DEFENSE by Woody Hayes	7
POWER SWEEPS FROM THE T FORMATION (End Sweep, QB Keep)	8
OREGON STATE'S BALANCED SINGLE WING by Tommy Prothro	10
PASSING FROM STANFORD'S SPREAD T by Jack Curtice	12
COACHING AIDS FOR YOUR OPTION PLAY by John N. Hooper	16
THREE-DEEP COVERAGE FROM BOX DEFENSE by Mel Adams	20
PROGRESSIVE WORKOUTS FOR X-COUNTRY by John A. Lucas	24
SPREAD-OPTION ATTACK by Andrew Grieve	28
TRAINING A 4:13.2 SCHOOLBOY MILER by Sam Bell	32
HOW ABOUT 8-MM. FILM FOR YOUR MOVIES? by Hainfeld and Flanagan	36
BRADLEY'S LOOSE SLOT by Billy Stone as told to Fred Filip	38
ROLL SERIES FROM THE WINGED T by George Baldwin	42
NEW EQUIPMENT	48
TEACHING AND COACHING SOCCER by Howard G. Knuttgen	54
COACHES' CORNER	60
NEW BOOKS ON THE SPORTSHELF	64
BASIC SIX RUSHING DEFENSE by Bob Swanson	68
1958 ALL-AMERICAN H. S. TRACK SQUAD	72

Cover: Scholastic-Ansco Photography Awards by Ron Chandler, Hamilton H.S., Los Angeles

> Publisher • G. HERBERT McCRACKEN Editor • HERMAN L. MASIN Advertising Manager • OWEN REED Art Director • M. J. DUNTON Art Editor • CHARLES L. HURLEY

SCHOLASTIC COACH IS ISSUED MONTHLY DURING THE ACADEMIC YEAR (SEPTEMBER THROUGH JUNE) BY SCHOLASTIC MAGAZINES, INC., PUBLISHERS OF SCHOLASTIC MAGAZINES FOR HIGH SCHOOL STUDENTS.

ADDRESS EDITORIAL AND ADVERTISING COMMUNICATIONS AND CORRESPONDENCE CONCERNING SUBSCRIPTIONS AND CIRCULATION TO SCHOLASTIC COACH, 33 WEST 42 5T., NEW YORK 36, N. Y.

SUBSCRIPTION FOR THE UNITED STATES, \$2.75 A YEAR, CANADA, \$3. FOREIGN, \$3.25. BACK ISSUES: CURRENT VOLUME, 35c; PREVIOUS VOLUMES, 50c.

THE ENTIRE CONTENTS OF SCHOLASTIC COACH COPYRIGHT, 1958, BY SCHOLASTIC MAGAZINES, INC.

SCHOLASTIC COACH IS A MEMBER OF THE BUSINESS PUBLICATIONS AUDIT, A BUREAU FOR EXAMINING AND AUDITING CIRCULATION FIGURES FOR THE PROTECTION OF ADVERTISERS. BPA STATEMENTS OF SCHOLASTIC COACH CIRCULATION SUPPLIED ON REQUEST.





"Soft Touch" plus Formula-15

Every game's a better game with an RSS—the top spot ball with universal acceptance throughout basketball. Its "Soft-Touch" construction, Formula-15 treatment and wide channel seams can't be equalled for sure-grip handling and positive finger traction...it's round when it's new and keeps a perfect spherical shape permanently . . and its built-in quality and fine workmanship promise durability far beyond normal expectation.

For perfect passing, dribbling, shooting ... for the kind of precision ball control that our modern game demands ... the RSS is in a class by itself ... "Basketball's Best Basketball!"





A Rawlings
ROYAL LABEL
BALL
FORMULA-15 TREATED

Basketball's Best Basketball!

per Panel—Trophy's gh film of protec-n came through this finish came off in ugly scratches, leaving the wood unprotected against moisture, dirt,

This Simple Test PROVES Why TROPHY

LASTS LONGER ACTUALLY COSTS LESS.

Each of the two halves of this hardwood sample was scratched with the same silver dollar, with the same force and pressure. Note TROPHY'S spectacular superiority! Trophy rates highest in abrasion index of any gym finish tested.

This is just *one* of the reasons why every major tournament floor and more than 15,000 of the nation's top-ranking gymnasiums and arenas are Hillyard-finished.

Hillyard TROPHY "Finish for Champions", the lightest, smoothest, longest-wearing, noglare, non-skid finish, is equally the favorite of coaches, players and spectators!

With a certified Abrasion Index (Toughness Rating)—highest of any gym finish tested—TROPHY much more than meets the requirements of Maple Flooring Mfrs. Assn. specifications.

Beautiful Charlotte Coliseum, Charlotte, N. Carolina. A. G. Odell, Jr. & Assoc., Architects



MAIL COUPON TODAY!

help on your floor care problems.

HILLYARD

THEOTEMENTS

Remember, the Hillyard "Maintaineer®" can give you expert help on your floor care problems.

> "On Your Staff, Not Your Payroll

ST. JOSEPH, MO. U.S.A. Passaic, N. J. San Jose, Calif.

Branches and Warehouse Stocks in Principal Cities

HILLYARD, S	t. Joseph, Mo. P.:
a "Tournam	me full information on how easily I can hav ent-class" TROPHY floor—and how this fin mplify maintenance.
Nome	
Name	1
	1



Prophet side of the ledger

OWDY, folks. Hope you all had a nice summer and that your football "house" is vibrating with the patter of elephantine feet.

We enjoyed a wonderful busman's holiday trekking around the country, meeting a lot of coaches whose comments about Scholastic Coach warmed every cockle of our heart. In fact, we're still floating around on Cloud 66.

Undoubtedly the highlight of our trip was a four-day stint as moderator of the first annual All-American Football Clinic at Santa Barbara, Calif. It was quite an honor to be elected for such high office, and we had a thumping good time sharing the dais with such fabulous coaches as Bear Bryant, Jack Curtice, Frank Broyles, Don Clark, Terry Brennan, Ray Graves, Phil Dickens, and Danny Devine.

We received a pretty good education—both in football and in prop shifting, stage lighting, electronics, sweeping, mopping, and bottle washing. The clinic's impresarios (Al Davis and Don Richman) really made us hustle for our buck, and we thought we did a good job of keeping the brains running on time.

Anyway, we came home a wealthier, wiser, and completely bushed editor. Here are some of the more provocative brain-storms we ran into during the summer.

WOODY HAYES (Ohio State): I think the 1958 season will see a lot more of the slot offense, particularly by teams with a good passer. Defense won't change so radically, but I expect to see a little more of the 6-1.

Insofar as the new collegiate extrapoint rule is concerned, I believe that coaches will go "for broke"—two points—at the beginning. But as the season progresses, they'll settle for one—if they have a good kicker. In our spring practice, we discovered that we could expect about 35% success with the two-point play (rush

or pass) and closer to 90% with the place kick,

The place-kick conversion should be a little easier from now on, since the two-point kick or rush possibility will tend to keep the defense more honest. The rush won't be so hard. To protect against the plunge or pass, the defense won't be able to rush more than seven men, where it was once able to rush 11.

FRANK BROYLES (Arkansas): I'm convinced that the most popular offensive formation this year will be the winged T. I also feel that line-splitting is on the way out. The accent will be on a tight line, for several reasons:

 The tight line affords doubleteam blocking and shorter pulling distance to facilitate your blocking at the point of attack.

2. It enables you to get outside much quicker because of the shorter distance to go,

3. It's essential in combatting changing defenses, especially those that are hitting the gaps with linemen or line-backers and thus (by their penetration) are causing confusion in offensive blocking and backfield patterns.

recommend the multiple offense for high school teams. By running from several formations, you force the opponents to prepare for a lot of offenses. And when they must work a great deal on defense, they're prone to neglect offense. They also tend to come up with a weak defense against at least one of your offenses—enabling you to exploit it effectively.

Keep your multiple offense simple at the beginning and add as you go along. We start with the T and single wing. Then we add flanker formations, motion, unbalanced-line left single-wing right, etc. We can run a play from 23 formations.

TERRY BRENNAN (Notre Dame): The thing that sold me on the slot offense was the cold statistical fact that we gained twice as much yardage from an open than from a closed formation. The slot offense is far more difficult to defense. Without doing a

thing, you make the defense changeforcing them to defend a wide area.

PHIL DICKENS (Indiana): I feel that coaches who run from the side-saddle T must understand that tremendous speed is essential at the half-back positions. Because of our lack of speed, we're turning to the straight single wing with a balanced line.

The single-wing option pass play has lost most of its effectiveness because of the international (Oklahoma) defense, which has a corner man protecting the flat.

RAY GRAVES (Georgia Tech): All of our defensive scrimmaging is conducted inside the 10-yard line. We feel that if we can control an opponent in this area, we can control him anywhere on the field.

The only individual defensive weapon we utilize is the hand shiver, with the stress on lateral movement and pursuit. In short, we want to keep the opponent away from our legs, assuring us maximum mobility.

In every long-yardage situation, our defensive ends yell "screen" and our middle guard yells "draw" to alert themselves to these plays.

The most demoralizing factor in defensive football is gang tackling.

BEAR BRYANT (Alabama): On defense, situate your best players—no matter where they play on offense—in the positions in which they can do the most good.

I expect to see a lot of stunting in the secondary as well as on the line of scrimmage.

In my practices, I never "jump" on a third-stringer. It seldom does any real good. I reserve my digs for the first and second stringers.

I always wind up practice with something the squad can enjoy doing together. When the squad leaves the field, I make it a point to always look them squarely in the eye and say something complimentary—even if it's only a grunt. I want to leave all bitterness on the field.

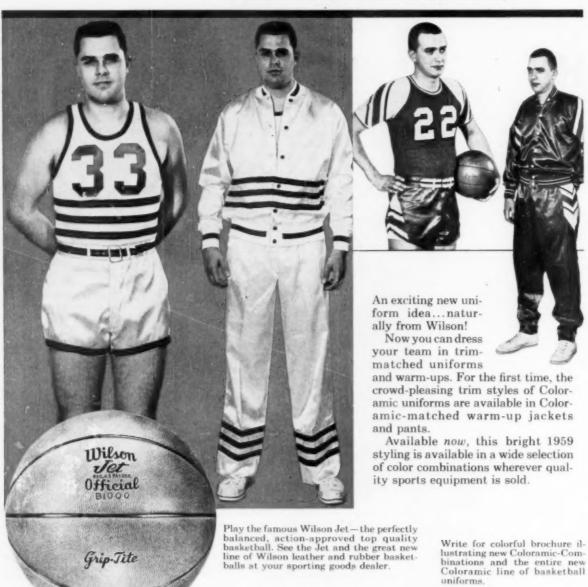
DON CLARK (U.S.C.): One of the most important fundamentals of block-(Concluded on page 53)

First From Wilson

COLORAMIC COMBINATIONS

Wilson Leads the Way With Matched Coloramic Trims For Both Basketball Uniforms and Warm-ups

Win With Wilson



By WOODY HAYES

HEAD COACH

HERE is no perfect pass defense, Accepting this, we must first stop the deep passes; second, stop the intermediate ones; and third, if possible, stop the short ones. This fits into our idea of "no cheap touchdowns."

Our basic strategy in pass defense is to "play the ball." For we feel that the passer is the most honest man in the pass offense. Whereas the receivers will come down the field using deceptive courses in trying to coax you out of position, the passer will always step and look in the direction he's going to throw. He may fake. But usually his fakes are ineffective.

We definitely feel that by playing the passer, the defender is giving himself extra time in which to get the ball. With practice he becomes much like a center fielder who's able to move almost before the ball is hit

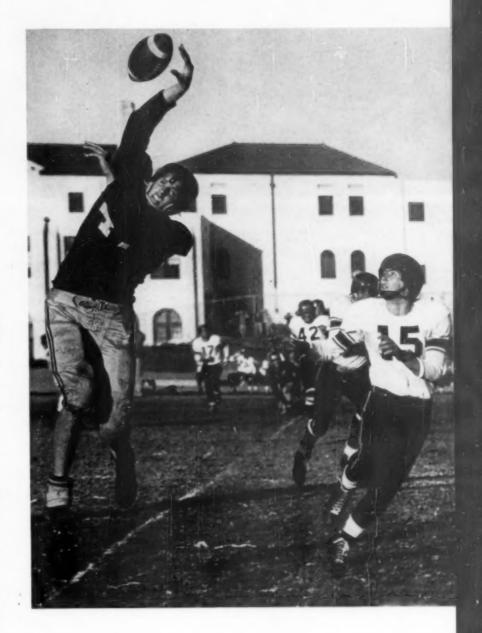
With practice studying the passer, the defense can leave before the ball is thrown. For if the passer decides to throw to another receiver, he must change his stance and recock the ball. This gives our defender plenty of time to recover.

Some coaches say, "Oh we do this, but we play the man until the ball is in the air." Here the error of reasoning is obvious. For how can the defender watching the receiver know when the ball is in the air? We feel you cannot serve two masters.

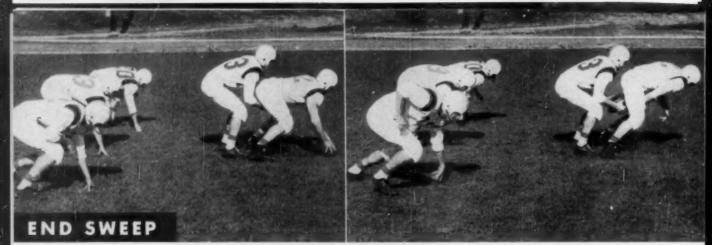
By playing the ball we're stressing interception, which is in line with our thinking on possession football. We don't play the ball to knock it down. We play it to intercept.

The element of human error is always present in football. If the man in the area where the ball is being thrown loses it in the sun, miscalculates its speed, or slips and falls down, this mistake doesn't necessarily mean a touchdown. The other men who are playing the ball are being drawn to it and will be there at least to make the tackle . . .

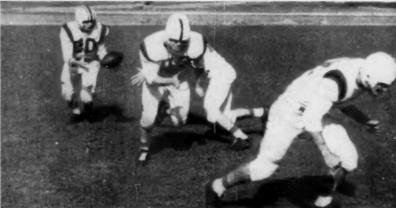
We've found that many intercep-(Continued on page 50)



OHIO STATE'S THREE-DEEP PASS DEFENSE



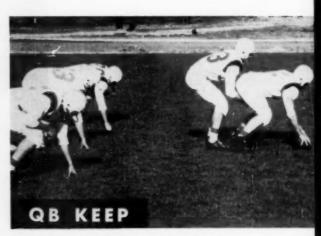


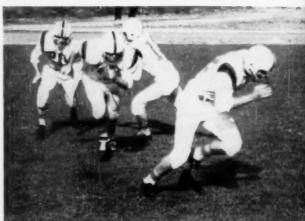


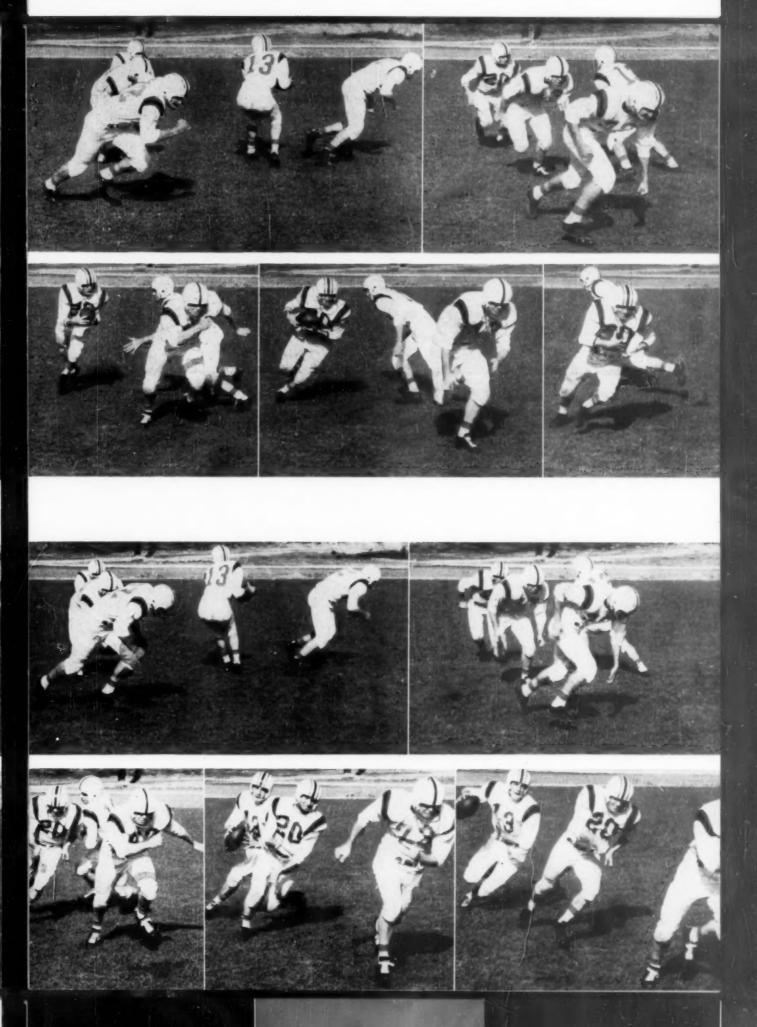
Power Sweeps from the T Formation

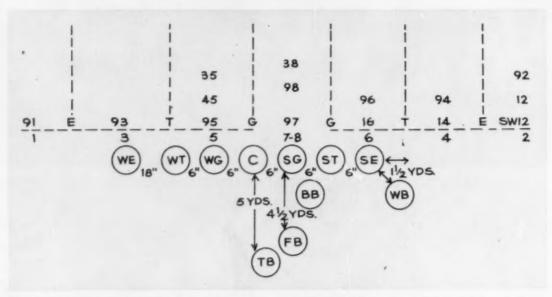
Demonstrated by the U. of South Carolina

A T THE propitious moment, after the hand-offs and option play have set up the defense, the power sweep and qb keep offer good ways of going outside for long yardage. In the end sweep (above), the qb reverse-pivots and pitches the ball back to the left half—the fleet King Dixon—as rapidly as possible. The right half quickly powers for the defensive end, while the left half follows the fullback on the sweep. The qb keep (right) is a natural follow-up. This time the qb fakes the pitch and rolls out behind the fullback and left half, faking a pass to keep the defense a little more honest. The third play in this sequence can, of course, be the roll-out pass by the qb.









Offensive alignment and line splits in basic formation. Oregon State numbers the defensive holes, starting from the strong side. If they shift to formation left, the holes formerly designated 1-3-5 become 2-4-6. The diagram also shows the plays designed to hit each hole (outlined on facing page). The tailback is the ball-carrier on all "teen" numbered plays, all "forty"

series, and "ninety" series which hit the 2 and 4 holes. The fullback carries the ball on all "thirty" numbered plays and on "ninety" series plays which hit the 5, 6, 7, and 8 holes. The wingback carries on "ninety" series plays which hit the 1 and 3 holes. It's possible to develop a 41 and 43 to supplement the weak-side attack.

Oregon State's Balanced Single Wing

URING the past few years, the balanced-line single-wing has been gradually increasing in popularity over the nation. It's interesting to note that in 1956, only four major college teams utilized this formation. But their records vividly illustrate the success which can be achieved with this style of offense.

Tennessee won the Southeastern Conference title by going undefeated in 10 games. Wyoming dominated the Skyline Six in achieving the same 10 and 0 record. Oregon State represented the Pacific Coast Conference in the Rose Bowl after winning the championship with a 7-2-1 record. And in the same conference, UCLA finished in second place with 7 wins and 3 losses.

Since 1956, Indiana, Iowa State, and Texas A & M have also adopted

the balanced-line single-wing. Phil Dickens, Clayton Stapleton, and Jim Myers, respectively, are the head coaches of these schools. All three played under Gen. Bob Neyland at Tennessee.

The single-wing as used by Oregon State is based on simplicity and detailed attention to basic fundamentals. Mastery of these fundamentals, which we consider to be the essential constituents of successful coaching methodology, receive constant attention.

Perhaps the most important concept is what we refer to as "the fundamental football position," whether on offense or defense. Other schools and coaches have developed this approach but have substituted the word "striking" or "hitting" in regards to terminology.

No matter what technique is be-

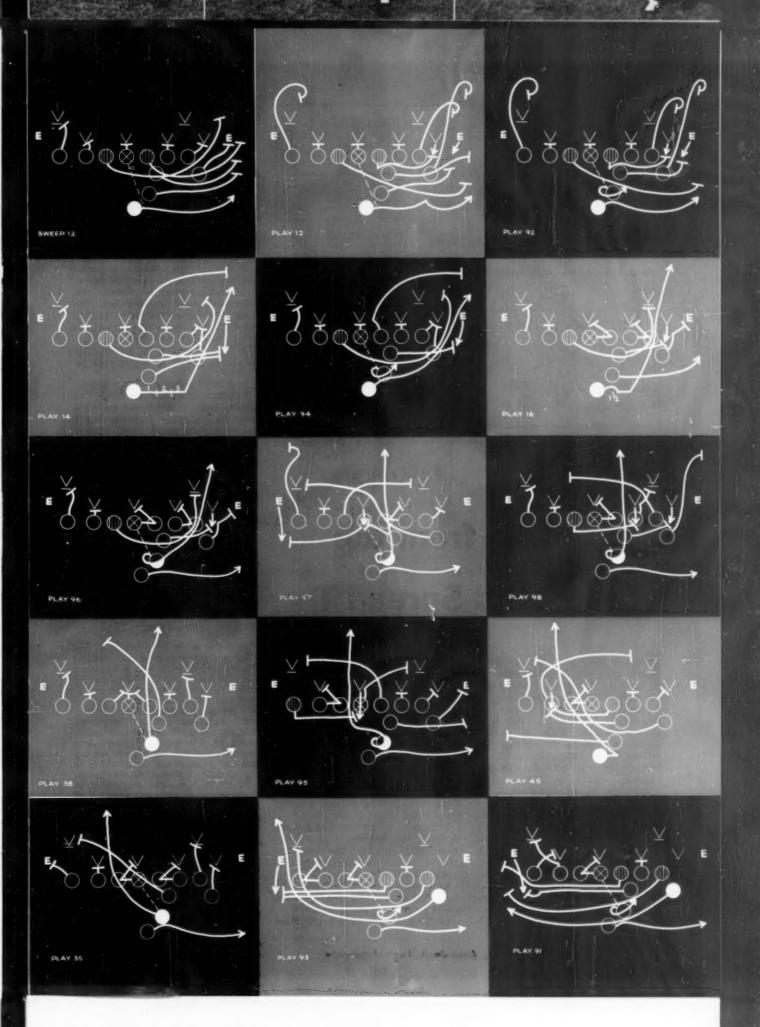
ing worked on, the player must have sufficient control of his body so he can react, maneuver, and strike in order to accomplish his assignment. Only by developing a sound, fundamental position from which to operate, can this be achieved with the greatest degree of success and the least possible chance for error.

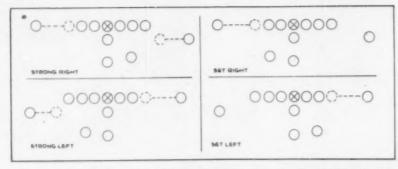
This fundamental position is a combination of balance, agility, coordination, and footwork. It can be briefly described as having the knees bent, head up, tail down, feet up under the body and working so the individual can react in any direction.

This body position guarantees mobility and striking power in the variety of situations which are presented to all players. This remains constant whether the athlete is playing on offense or defense, whether he's blocking or tackling, etc. Of course, modifications of the

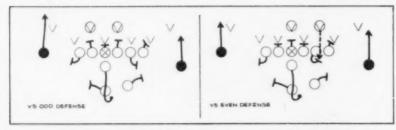
(Continued on page 79)

By TOMMY PROTHRO (HEAD COACH)





Diag. 1, formations with variations in spread of ends and flankered backs



Diag. 2, "Everybody Block Protection" vs odd and even defenses

Passing from the Stanford Spread T

RACTICALLY every coach today is labeled either a passing coach or a running coach. Seldom is he looked upon as a master of both. Now it's true that jitterbug defenses and the like complicate offensive planning. Nevertheless, I still believe that every offense must strive to attain a balance between both running and passing.

With this in mind, I've attempted to dovetail as closely as possible the pass patterns and running plays from a Spread or Flankered T. One phase of the game complements the other to produce a diversified offense—quick-hitting running power along with the ever-present threat of the pass. This type of offensive approach places mounting pressure on the opponents' defenses and per-

I'm sincerely convinced that tying in your running game with your passing attack has much value in developing an all-around offense. Insofar as the passing game is concerned, it possesses the following advantages:

 There's always the element of surprise with well-executed plays.

2. Movement by the quarterback in throwing from different areas in the backfield discourages the defense from putting on concentrated pass rushes to get to him.

3. Fake of a run into line freezes or holds linebackers in place momentarily, leaving the medium passing zones open—particularly down the middle.

4. A running-action backfield fake slows internal defensive linemen, which helps pass protection.

Looking at the advantages from

a running point of view, the running-play passes establish several detrimental problems to the defense:

1. Lessens the tendency of the opponents to use a stacked running defense to stop your best ground-

gaining plays.

2. Creates uncertainty of mind and hesitation in the play of defensive men, especially linebackers, ends, wings, and halfbacks, particularly after one has been burned playing for a run which turned out to be a pass, or vice-versa.

3. Causes concern in establishing consistent overall defensive plans or

strategy.

4. Allows passing on any down. In planning a passing offense, I've always kept in mind four essential factors . . . aside from having a golden-armed passer and stickyfingered receivers! Briefly they are:

Offensive formation or formations from which to throw and run.
 Possibilities of developing effections

tive pass protection for all series of passes.

Development of enough pass patterns to cope with various defenses and pass rushes.

4. A few special plays to keep the defenses honest in order to make the basic runs and passes more effective.

I'll elaborate on the above points in detailing the offense we use at Stanford.

OFFENSIVE FORMATIONS:

As a formation from which to develop a striking passing and running attack, there's none better than the Flankered or Wing T with variations in the spread of the ends and flankered backs. I assume this can also be referred to as a Spread T.

While coaches agree that the Flankered or Spread T lends itself beautifully to the passing game, some men feel that it is strictly for passing and not a good one from which to also develop a strong running game.

Now, I'm from the old school of "rock and sock football," but I can't go along with such thinking. In the shadow of the goal posts, I'm convinced that a hard-hitting, aggressive running attack can be built into the Flankered or Spread T right along with the passing game. While I don't have the space to present a detailed account of our running offense, from the pass patterns you can readily see the running plays from which many of the passes evolve.

Briefly, our running attack includes:

(1) Traps—HB and FB, to get up the middle;

(2) Handoff—HB, to go straight ahead;

(3) Slice or Power

By JACK CURTICE, Head Coach, Stanford University

Play—HB-FB, to go off-tackle; (4) End Runs, Option play, and Quick Toss—HB-FB, to go wide around the ends.

In selecting an offensive formation, I've always felt that it's to the offense's advantage to have more than one basic alignment, as long as it doesn't hamper the offensive assignments. I'm strong for giving the defense as much trouble as possible, even before the play starts, and if I can worry them by changing my offensive alignment slightly I'm all for it.

For this reason, we've included the offensive formations with variations in the spread of the split end and flankered back, as shown in Diag. 1.

Pass Protections:

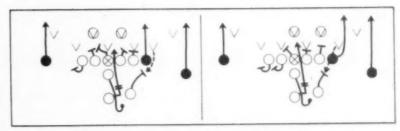
To utilize the theory of throwing from drop-back action as well as off many of our running plays, it became necessary to develop five types of pass protection. They're listed and drawn with brief explanation:

1. Everybody Block Protection (Diag. 2): In this type of cup protection, we know our quarterback is going to drop straight back 6-7 yards, then step up and throw from the cup. With this protection, we usually have a two-man pass pattern with 8 men protecting to give the receivers time to out-maneuver a defensive halfback with his own fakes or cuts.

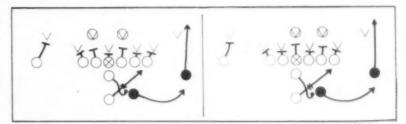
2. 30 Late Protection (Diag. 3): This is the same as the running play, probably better known as the "Draw." On this pattern, the fullback steps to his right, gets in a hitting (blocking) position, then as the quarterback comes back to throwing position, he fakes the hand-off to the fullback. The only "must" assignment is that the fullback always hits to the right of the center and block anyone in the hole.

3. 37 Protection (Diag. 4): This calls for aggressive blocking that we label "torpedo" blocking. We want the linemen to hit their opponents right in the "navel," for we believe a good belt in the belly makes them bring down their arms and opens up the passing lane for the thrower. The linemen really fire-out on this block. Our fullback fires right at the offensive tackle's outside hip and barrels in hard to make the play appear to be our off-tackle slice!

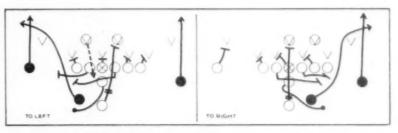
4. Roll-Out Protection (Diag. 5): In some ways, this resembles our trap series. Both guards pull to the side of the play, while the fullback fires right up the alley (up the middle)—as all our linemen block the man in front of them or away from the play. The first pulling guard blocks the first defensive man outside our offensive tackle, while the second guard picks off the second rusher on the outside.



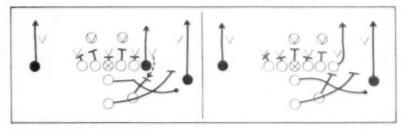
Diag. 3, "30 Late Protection" (same as running play known as the Draw)



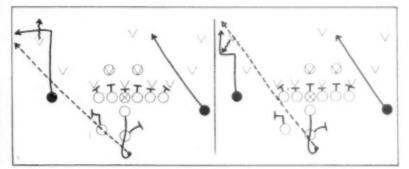
Diag. 4, "37 Protection" (aggressive blocking known as Torpedo Blocking)



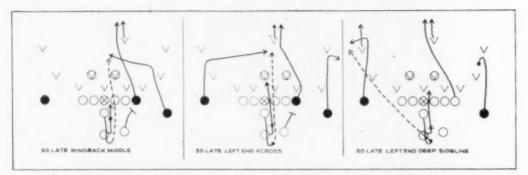
Diag. 5, "Roll-Out Protection" (resembles the trap series in some ways)



Diag. 6, "39 End Run Protection" (everyone on line blocks solidly)



Diag. 7, "Everybody Block Series" (ball thrown to spread end or flanker)



Diag. 8, "30 Late Series" (Wingback Middle, Left End Across, and Left End Deep Sideline)

5. 39 End Run (Diag. 6): Everyone on the line blocks solidly, as the quarterback works right down the line then breaks back and to the outside. Sometimes we'll pull the off-guard or the puller away from the side of the play.

Pass Patterns:

With our pass patterns, an important point to keep in mind is the position from which the quarterback will throw. In our "Everybody Block" series, he drops straight back; but in our running-action passes he throws from different areas in the backfield.

Note this in the diagrams, for it's essential that the quarterback get to his throwing area before attempting to throw. From each type of protection, we also have a series of 2, 3 or 4 passes.

1. Everybody Block Series (Diag. 7): From this series, we throw our best gainer—the one you see the prosthrow every Sunday. We throw this one to the spread end or our flanker.

Everybody block is just what the play dictates. We send the flanker or spread end down and out, on an individual pass cut, such as a sideline, and have the other eight men block while the quarterback throws. We're always looking for a one-on-one situation when we spread an end or put out a flanker.

The theory we follow on this pattern is to throw to the hole behind the receiver and have him come back into the pass and catch it running at an angle toward the sideline and back toward the line of serimmage. We'll run this two, three, four times until we feel that the defensive back is ready for the sideline-and-up pattern to go for the deep td.

2. 30 Late Series (Diag. 8): We usually throw down the middle, and anytime we throw down the middle we're going to give those linebackers something to look at and something to hold them at home and keep them busy.

Our passer drops back, as the full-back hits down the middle. The quarterback fakes the hand-off to the full-back, and the fullback goes into that line like a wild-eyed steer looking for a hole in a fence. The right end goes down through the safety and knocks him out of the play, as the flanker makes his cut into the middle.

We also throw to the left end breaking into the middle or on a deep sideline. Again we keep the safety man busy so he can't double up on the intended receiver.

3. 37 Hook Series (Diag. 9): This is a quick-hitting pass. The quarterback takes the snap, jumps back and out at a 45° angle as the fullback slants in at the outside hip of our offensive tackle. Remember, we have aggressive blocking on the 37 protection.

The quarterback watches the line-backer and "soft" man (the man playing our flanker) on the side the playis called. Our flanker goes down about six yards and hooks. If he's covered, our passer looks to the sideline and hits the swing man (RHB). What we're looking for is the halfback coming up hard to play the flanker as he hooks.

This builds up our hook and deep.

On this pattern, our swing man, instead of going parallel to the line of scrimmage to take the safety-valve pass, cuts right off the position our flanker had lined up in. The quarterback fakes the hook and the swing man pours on the coal, with the quarterback hitting him just as he clears the halfback. If the ball is held too long, the safety can recover and get into the play.

Another pattern we've found successful is our hook and corner. The flanker runs a hook pattern; then, on the fake, breaks deep for the corner as the passer throws into the side-

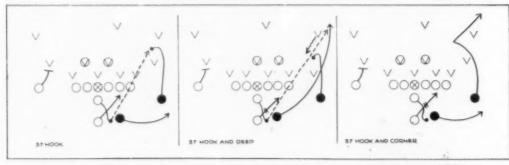
4. Roll-Out Series (Diag. 10): In our roll-out pattern, we kind of favor going away from the flankered side. We like to catch the "rotators" off-balance.

On this pattern, we pull both guards and blast our fullback up the middle. Our second guard looks for a shooter in the 5-4 defense, while the fullback going up the middle catches the other "red-dogger" if they decide to shoot.

Meanwhile, our quarterback is rolling left. We get the one-on-one with our left end moving against their right halfback. We throw the down and out sideline to the left end, then tease them with the left end hook. When and if they play our hook, we try to go all the way on the hook and deep.

Another pattern that has worked well is the companion play of the left end down and out, wherein the right end and flanker exchange assignments. On all left end down and outs off a roll-out, we had sent the flanker down

(Continued on page 82)



Diag. 9, "37 Hook Series" (37 Hook, 37 Hook and Deep, and 37, Hook and Carner)

Game-Tested

PENNSYLVANIA

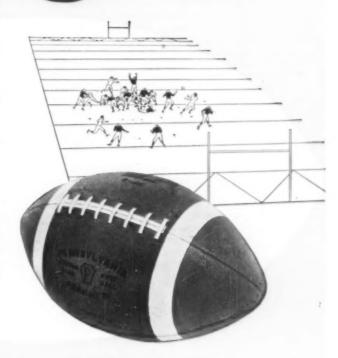
Now

OFFICIAL

and Ready

- Fast growing acceptance of rubbercovered footballs and basketballs by coaches and players alike has led to two important rules changes.
- For Pennsylvania it is the successful result of a long period of testing under actual game conditions.
- Rules change provides for Pennbilt basketballs and footballs to be official for varsity play starting with the 1956 season.
- Basketball *(Rule 1-12) Beginning with the 1956-1957 season, a ball having a cover other than leather but meeting all other specifications is legal for any high school or Y.M.C.A. game.
 - *Official basketball rules of the National Basketball Committee of the U.S. and Canada.
- Football **(Rule 1-3-1) By agreement of both teams or by conference adoption or by election of either team while on offense, a properly constructed rubber-covered football (such as PF-6) may be used in varsity play.
 - **Official football rules of N. C. A. A. and National Federation of State High School Athletic Association,







THE GENERAL TIRE & RUBBER COMPANY

PENNSYLVANIA ATHLETIC PRODUCTS DIVISION . AKRON, OHIO

"Preferred for Performance"

Three Extra Coaching Aids for Your Split T Option Play

By JOHN N. HOOPER

Head Coach, Wayne Township (N. J.) High School

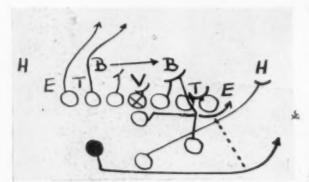
ANY coaches believe that to be successful with the Split T option, you need an exceptionally talented quarterback. Now, a boy who can consistently react correctly to the play of the defensive end certainly will make your job a lot easier. But even without such a qb, there's still a great deal you can do to make the option play the threat it should be in your offense.

We've been using the option play as the hub of our offense for the past five years. It has only been recently, however, that we've gained full potential from this pattern. Much of this added strength stems from the many tips we've gleaned from coaching friends who, like ourselves, have been experimenting with the intricacies of the play. Besides the textbook fundamentals, there are three definite teaching aids that have contributed tremendously to our success with the option.

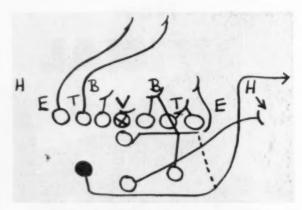
The first of these three aids involves blocking technique at the line of scrimmage. We realize that our quarterback must perform several tasks that aren't easy to learn and master. To expedite the learning process, we've adjusted our blocking techniques at the line of scrimmage. We want our quarterback to feel confident that he can move laterally and go off-tackle without a great deal of interference from defensive linemen.

Wherever possible, we want to double-team the defensive tackle so as to drive him deep and interfere with the defensive pursuit of the interior and off-side linemen. Also, we ask our on-side halfback to fake hard at the crossroads and then to block in on the guard or interior linebacker, as the situation dictates (Diag. 1).

Notice that each defensive interior lineman toward the side of the play has been double-teamed—the defensive tackle by the end and tackle and the interior linebacker by the guard and on-side halfback.



Diag. 1, Double-Teaming Technique



Diag. 2, Fullback Blocking Out on Corner Man

Following the theme of the option play, the end is left unblocked. The only exception to this rule is made when the end comes across the line of scrimmage and assumes an intermediate position between the lateral paths of the quarterback and the swing halfback. When in this position (a point two yards over the line of scrimmage), he's blocked by the fullback to prevent him from reacting to either the keep or pitch option of the quarterback.

We feel this double-teaming technique not only aids the qb in making an unmolested decision at the crossroads, but also helps him make substantial yardage on his own, should be elect to keep the ball and turn upfield off-tackle. The double-team is an integral part of our thinking on the option play. We use it because it works.

A second technique we have found very helpful involves the backfield patterns of the fullback and swing halfback. When running the quarterback option play against a nine-man alignment such as the Oklahoma 5-4, its success depends a great deal upon the type of block used on the corner man (player H, Diag. 1). To facilitate the fullback's block on this man, we ask the swing halfback "to run in the hip pocket of the fullback."

If the swing halfback is lazy and allows the fullback to get too far ahead of him on his blocking assignment, the corner man will be able to outmaneuver this blocker and be in a position to react and tackle the swing man. Unless the corner man is forced to elect either an inside or outside responsibility, he'll be a tough man to block.

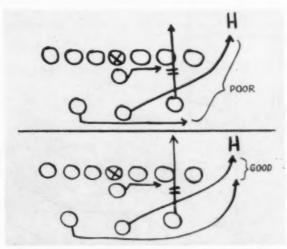
However, if the swing halfback attempts to gain outside position on the defensive end before the pitch is

made, and then runs a path that will close the gap between him and his blocker, he'll be putting the pressure on the corner defender. In this situation any commitment by the corner man will be a wrong one.

If he steps to the outside to defend the wide play, the fullback will take him out and the ball-carrier can come up inside (Diag. 2). If he allows the fullback outside position, he'll be blocked in and the play will go wide (Diag. 1).

We ask our fullback to gain outside position on the corner man and then block him in. However, if the corner man fights to the outside, the ball-carrier is instructed to turn up inside the block and then break for the sideline and attempt to outrun the defensive pursuit from the offside linemen (Diag. 2).

In taking his initial steps, the swing halfback should deepen his lateral path toward the sideline to a point five yards deep from the line of scrimmage. When he receives the qb's lateral at this point, however, he must attempt to gain a position "in the hip pocket of the fullback" and keep the pressure on the corner man.



Diag. 3, Poor and Good Block Setting Relationship

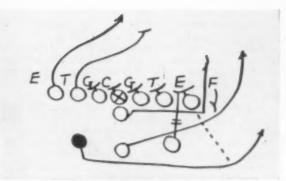
Diag. 3 illustrates the correct and incorrect relationship of these players. In the incorrect illustration, the swing halfback has allowed too great a distance to develop between himself and his blocker. This permits the corner man to maneuver and play this man off; he can remain on his feet and close to tackle the ball carrier.

If, however, the relationship between these two men is closer (correct illustration), the pressure is on the defensive player, and the ball-carrier should be able to break off the fullback's block. In any open field blocking situation such as this, it's greatly to the advantage of the ball-carrier to close the gap between himself and the blocker and help set up a block on the defender.

This principle is a most important contributor to the success of the option play against a nine-man alignment. Unless the fullback's block is effective and utilized by the ball-carrier, you cannot hope to be successful.

A third contributing factor centers around the qb's ability to call the option play at the correct time. Where your qb is schooled in predicting the defensive alignment of his opponent in certain situations, his chances of success will be substantially greater.

Usually the option play is a very good call against a goal line or short yardage defense. If you can predict,



Diag. 4, Fold Blocking (Eight-Man Line)

for instance, that your opponent will be in an eightman defensive alignment inside his own ten-yard line, you should have little trouble in scoring.

Diag. 4 illustrates a "fold in" blocking technique. Notice that a gap 8 presents a situation where each blocker on the side of the play has an outside angle on his opponent. If the guard, tackle, and end, respectively, fold in and block the first man to their inside, they will not only prevent penetration into the backfield but also will limit the immediate threat of outside pursuit from these three defensive players. If the qb makes a logical decision with his option on the defensive end, there should be little chance for failure.

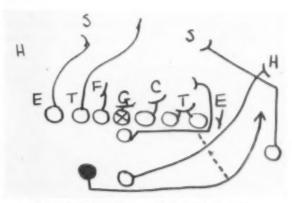
The eight-man blocking assignment is an exception to our double-teaming techniques, but because of the decided advantage of the outside-in angle we feel that "one on one" fold blocking is desirable.

Most teams expect you to go wide on long yardage situations and inside on short yardage situations. Therefore, if you have a fairly well-balanced attack, you should take advantage of blocking angle when your opponent has you outmanned from end to end. The option is one play that will allow you to do this very thing.

Another extremely helpful idea is that of rotating the defensive alignment into a coverage that you know you can attack successfully. Diag. 5 shows basic rotation of the secondary to a flanker set opposite. Against this particular defensive adjustment, the option play is one of your better calls.

Because we frequently throw from flanker-opposite formation, we've found the running game toward this flanker a most successful part of our offense.

On the snap, the flanker runs a pattern straight down the field toward the defensive halfback. When



Diag. 5, Option Play to Flanker Set Opposite

he reaches a point over where this defender was standing, he turns sharply and blocks in on the safety man to his side (Diag. 5).

Defensive halfbacks usually will retreat initially on the snap. Because they're responsible for the deep outside zone on pass plays, they're forced to keep both vertical and lateral position on the flanker until a definite running threat is revealed.

This retreating action works in your favor. The hesitancy on the defensive half's part gives the play time to develop and permits the fullback to get out in front of the play, so that he's in good position to block out on this man as he recovers to close on the ball-carrier.

Without the aid of the handoff fake to keep the interior defensive linemen at home on the line, we ask our quarterback to turn the corner after he has lateraled to the swing halfback, to prevent defensive pursuit by the interior linebacker.

The pattern illustrated in Diag. 5 has been one of our better option techniques. We've found that it leads our option statistics for yards gained per attempt.

Like everyone else, we want our qb to step up and out as he takes the exchange from center. We ask him to keep the ball at waist height and to operate down the line of scrimmage. Actually, we don't give him any exact steps after his initial movement up and out. However, we do want him to condition himself to react upfield immediately should the defensive end penetrate into the backfield.

In coaching our quarterbacks, we never drill them on the keeper play, since this is the easier alternative of the series.

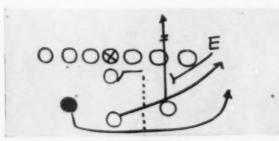
We expect the qb to learn to lateral the ball to the swing man accurately and consistently, using a dead-ball pass about letter high. The pass must be soft enough to be easily fielded by the swing halfback.

This training is started on the first day of practice and is continued each day throughout the season, since the lateral pitch is the most difficult individual technique in the option play.

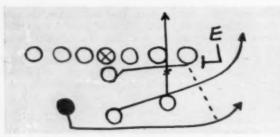
As a teaching aid to develop accuracy, we tell our qbs to judge the direction of the lateral pass by the amount of time they hold the ball after the exchange. If the end crashes down the line and forces them to pitch quickly, the ball should be lateraled directly back or perhaps even slightly behind the quarterback. This is necessitated by the fact that the swing halfback has just started his lateral path and hasn't had time to get out in front of the qb for the pitch. See Diag. 6.

If the defensive end retreats slightly or holds his position on the line, the pitch can be made slightly ahead of the qb because he can hold the ball longer and the halfback will be further out in front, **Diag.** 7.

We ask our qbs to practice a blind pass throughout our workout season. This training helps him judge the angle at which the ball must be lateraled. While we know that our qb will take a quick look under fire, this quick glance becomes more beneficial after he has



Diag. 6, Playing the Crashing Type of End

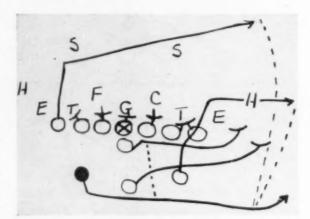


Diag. 7, Playing the Waiting Type of End

been passing the ball blind throughout every practice session.

Skill in this lateral pass is essential to your Split T offense; you cannot be successful without it. We make every effort to have the halfback out in front when he receives the pass. But, wherever he is, we want to complete the pass. There's no easy way, no short cuts, to teach the option play. It requires constant practice.

As a supplement to our option pattern, we also employ an option pass (Diag. 8). This play is designed to keep the defense honest and has proven an excellent third-down pattern.



Diag. 8, Option Passes to Keep the Defense Honest

Our line blocking doesn't change in this pattern, except for our off-side interior linemen who now must remain on the line instead of going downfield. Our guards contact their opponents only when they're on the line of scrimmage.

We ask our qb to make a blind pass directly back on his first lateral step. This gives the halfback more time to handle the ball before throwing on the run. He has two eligible receivers downfield—the on-side halfback, who's in the flat two yards deep, and the off-side end, who runs a pattern 10 yards deep behind the on-side safety man.

This play is actually an option pass or run. We want our halfback to run the ball if he can make the first down and to throw only if he has a receiver open. We never want to throw the ball away. But at the same time, we hope we can impress our opponents with our ability to throw while on the run.

The coaching points dwelled on in this article have proven a real aid in our teaching of the option play. We weren't successful with the play until we incorporated each of them into our thinking and our coaching. If you're not enjoying the success your option play deserves, perhaps one of these coaching points will help you solve the problem.



MacGregor Chin Straps and Face Guards



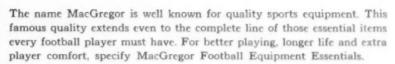
MacGregor chin straps are processed with large soft leather chin piece and two adjustable snaps.



3

SGM

There's a MacGregor Face Mask and guard for every style and type of helmet. Choose from nylon bar, clear plastic, plastic and metal reinforced, and doublebar models.





MacGregor Bruise Pads

Choose from a complete line of these fine quality bruise pads. They're made of compact and lightweight Processed Absorblo. This remarkable slowrecovery material is non-toxic. Will not absorb perspiration. Waterproof. Mildewproof. Gives perfect shock-resistant protection. Keeps shape indefinitely.



Lightweight Peckham Knee Brace

The Peckham knee brace will keep your regulars in the game and playing at normal efficiency. This lightweight brace does what no other knee brace will do-keeps knee joint in place, does not restrict speed or ability to turn, pivot.

G046

MacGregor

"The choice of those who play the game"

THE MACGREGOR CO., Cincinnati 32, Ohio . FOOTBALL . BASKETBALL . BASEBALL . GOLF . TENNIS . TRACK





Three-Deep Coverage from the Box Defense

URING the last few years, the five-four defense has become the most widely used bastion against the various T-formation running attacks. With good reason, too. It has done an effective job of containing the running game.

Unfortunately, however, it has proved vulnerable to down-the-middle "home run" passes. This has made some type of rotation a must.

With Oklahoma's development of the optional pass-run—an old single wing play—and Iowa's success with the roll-out pass, many coaches are asking their corner men to do the impossible—stop the sweep while still covering the flat on the running pass.

Many teams are spotting the offense one of the flat zones to get a five-man rush. But this creates a problem. If practiced continually, it will soon be picked up by the scouts and the defense will be in trouble.

To solve some of these problems, we first switched our corner backs according to field position, and more recently we've been switching our safeties as well. We now intend to add our ends to the switching unit. We'll use a weak-side end to dropoff and cover the flat on drop-back passes, while our strong-side end will play the running game.

This deployment will give us a very flexible ratio of pass-rush coverage. It will offer everything from a "four-man rush—seven-man coverage" to a "seven-man rush—four-man coverage."

On each call, the defensive quarterback will signal strong-side right or left after considering field posi-

By MEL ADAMS
Coach, Logan (Ohio) High School

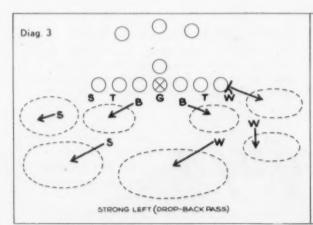
tion, offensive tendencies, etc. We'll have a strong-side end, corner, and safety; and a weak-side end, corner, and safety. The strong-side members will go to the side called, and the weak-side ones to the opposite side.

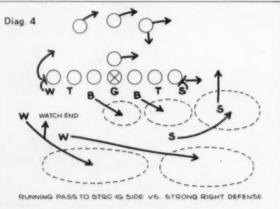
Diag. 1 shows our "54 Strong Left" and Diag. 2 our "54 Strong Right."

On a drop-back pass, the strongside end rushes and the weak-side end drops off covering the flat. Diag. 3 shows our call "Strong Left" (Drop-Back Pass).

Our movement provides a rotation to the strong side on all drop-back passes. If we were in strong right, the rotation would be opposite. The weak-side end, on a regular call, will drop off. This gives us good coverage in the weak-side flat zone.

We don't expect the weak-side





AMERICA'S No.1 BASKETBALL SHOES

In your choice of 2 great models!

Winning play in basketball demands the best in basketball footwear. Corverse "All Stars" have won and maintained overwhelming preference among players and coaches everywhere. If you want the best for your squad, just tell your dealer or distributor —"All Stars, of course!" CONVERSE

Chuck Taylor

ALL STAR

BASKETBALL SHOES



Completely new conception in design, incorporating features never before available in a low-cut basketball shoe: ANGLE-CUT HIGH FRONT QUARTER provides snug, wrinkle-free instep support . . . CONTOUR FITTED HEEL COUNTER for glove-smooth, positive fit . . SEAMLESS FOREPART to eliminate chafing. Black or White; Men's sizes 3 to 17, Women's 4 to 10.



First on the courts for nearly 45 years. Still the world's outstanding basketball shoe . . . worn by more leading teams in high school, college and major league play than any other basketball shoe made. Black or White; Men's sizes 3 to 17, Women's 4 to 10.

BOTH ALL STARS feature

- COOL, COOL FREE-BREATHING loose lined army duck uppers
 - LIGHTWEIGHT for speed
 - . FOOTFORM LAST
 - ARCH CUSHION combined
 with shock absorbing e
 sponge insole
- . RUGGED PROTECTIVE TOE GUARD
- DOUBLE SOLE BINDING
- NON-MARKING MOLDED OUTSOLE for positive traction
- FABRI-GARD LINING is treated to better withstand chemical action of perspiration
 - EASILY WASHABLE with mild soap and water

CONVERSE 1508 50 M

CONVERSE RUBBER COMPANY, MALDEN 48, MASSACHUSETTS



In Canada: Hanson Mills Ltd., Hull, Quebec

end to drop off against a running or flow pass. He plays it as a running play. See Diag. 4, "Running Pass to the Strong Side vs. Strong Right Defense."

The strong-side corner plays the flow pass exactly as a running play.

The strong-side safety moves to the outside and looks for the halfback or end coming into the flat zone. He keys the end first, then the halfback.

The weak-side safety moves to the strong side in a path that will carry him one yard behind the strong-side safety's pre-snap position. He looks for the end or halfback coming to the deep, outside strong-side zone.

The weak-side corner man drops off and through a position one yard behind the weak-side safety. He looks for the end on his side in the deep center or the end cutting outside for a cross-fire pass. This defender has a large zone, but the ball must travel a great distance to enter his zone.

A running pass to the weak side would probably be run to the short sideline. (See Diag. 5, "A Running Pass to Weak Side vs. Strong Right Defense.") If the ball were in the center of the field, we would most likely be in a strong left defense. The weak-side corner plays a sweep.

The weak-side safety moves to the outside and looks for the halfback or end coming into the flat zone. He keys the end first, then the halfback.

The strong-side safety moves to the weak side in a path that will carry him one yard behind the weak side safety's pre-snap position. He looks for the end or halfback coming to the deep, outside weak-side zone.

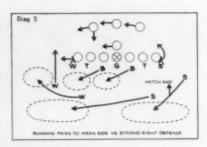
The strong-side corner man drops off and through a position one yard behind the strong-side safety. He looks for the end coming down and into the deep center or the end cutting outside for a cross-fire pass.

FOLLOWS ONE PATH

This defense is workable because each man is following a path against the running pass that's exactly the same as his path against a running play. It furnishes all the benefits of a three-deep defense, but still provides the soundness of a nine-man front against the running game.

From a basic defense, a basic call would give us a seven-man coverage with a four-man rush.

If we should desire a change of pace, or feel that we can effectively rush a good passer, the quarterback has three calls.



To the "54 Strong Left," he may add "Shoot 1." This would tell our left linebacker to shoot, making a 5-6 ratio

If he calls "Shoot 2." both linebackers shoot. This doesn't hurt our

deep coverage.

On "Shoot 3," both backers shoot and the weak end crashes. This spots the offense our weak-side flat, but it gives us a seven-man rush and still protects the deep zones. With a seven-man rush, the coverage against a running pass remains the same.

The quarterback doesn't call our line stunts. He calls for shooters only in what he considers a passing situation. Our line stunts are called by a linebacker, always with the formula, "remaining yardage divided by remaining downs," in mind. If the answer is less than four, we're in trouble and we stunt.

Our flanker principle is "slide with a peeler; rotate to a flanker."

GUIDING RULES

Corner Rules:

- 1. End, fullback or onside halfback out-peeler-deepen and cover him outside.
- 2. Your halfback moves to the opposite side-deepen to eight yards and stay three yards outside.
- 3. The opposite halfback comes to your side-move up and become the defensive end. If a drop-back pass develops, drop off to the flat.

Safeties:

1. If the end, your halfback, or the fullback is out-peeler-make no adjustment, but watch for a deep man in your zone.

2. When your halfback goes to the opposite side, move over to cover the deep middle zone. Be ten yards deep and in front of the offensive guard on the flankered side.

3. The opposite halfback flankers to your side-move over and cover the outside zone. Stay eight yards away from the flanker and slightly to his outside unless the flanker is close to the sideline.

We feel that this defense is always "three deep"; but we're giving assignments that high school boys are able to execute.

NOW... A COMPLETE KIT FOR TRAMPOLINE INSTRUCTION

One Handy Kit Contains Everything You Need from World's Leading Physical Educators





"Trampolining," 44
page illustrated book
by NEWTON C. LO
KEN, Gymnastics
Coach, University of
Michigan, Hundreds of
Trampoline exercises.



"Progression Checklist for Trampolining" by GEORGE SZYPULA Gymnastics Coach, Michigan State University. His own tested, approved method.



"Trampolining Teaching Guide," by RICH HARRIS, Gymnastics Coach, Arcata High School, Arcata, California. Complete lesson outlines, easy to follow.



"Trampoline Performance Chart" by CHAR-LIE POND, Gymnastics Coach, University of Illinois. Ideal for recording individual performances of students.



"Test Questions and Answers for Trampolining Instructors," by TES BLAKE, former Instructor of Gymnastics, University of London, England.



"Clinic Tips" by KURT BACHELER, Swiss Gymnast and Ski Instructor. What to do and what not to do in arranging and staging Trampoline clinics. PLUS . . . the latest issue of MODERN GYM-NAST, America's foremost publication devoted exclusively to gymnastics . . . instructional wall charts . . . and new complete catalog of Nissen Trampolines.®

ALL YOURS FOR ONLY \$1.00!

Never before such a vast supply of valuable Trampolining information in one package!



"The Most Complete Compilation of Useful Information I Have Ever Seen."

 Harold Frey, Asst. Supervisor of Physical Education, Gymnastics Coach, University of California, Berkeley

"Has Proven Invaluable in Teaching. I Have Learned a Number of Important Points about Trampolining from it, too."

 Edsel Buchanan, Director, Intramural Athletics for Men and Gymnastics Coach, Texas Technological College, Lubbock

SEND FOR YOUR COPY TODAY

NISSEN Trampolin	e Company				
200 A. Avenue, N	I. W., Ceda	r Ropids	, lewa		
Please send new	COMPLETE	TRAM	POLINE	TRAINING	KIT
Enclosed find my	check for \$1.	.00.			
	check for \$1	.00.			
Enclosed find my	check for \$1	.00.			
Enclosed find my	check for \$1	.00.			
Enclosed find my	check for \$1	.00.	STATE		



Scholastic-Ansco Photography Awards

Progressive Workouts for H.S. Cross-Country

HERE have been too many instances where the comparatively severe training demanded of today's half-milers and milers have resulted in injuries, excessive and long-lasting exhaustion, and mental fatigue.

It's the contention of the author that if new training methods are to be applied to high school runners competing indoors and outdoors, then it's sensible and imperative to apply fresh, relatively new ideas to cross-country training—the "solid rock" foundation of all races above the quarter-mile.

Too many high-school coaches are fearful that a challenging cross-country program may 'burn out' the athlete before the track season arrives. Consequently, a simple, uninspirational, and ineffective plan is often used.

This is an injustice to the boy who aspires to championship performance and impractical in light of the commoness of sub two-minute half-milers and four-thirty milers in our high schools,

Teaching is sometimes accomplished by indicating what not to do. The following mid-season training program is taken from a standard textbook, copyrighted 1930:

Monday: Run easy 2 miles, Rest. Sprint 75 y. Exercise 5 minutes.

Tuesday: Run 11/4 miles at racing speed against watch.

Wednesday: Same as Monday. Thursday: Same as Tuesday. Friday: Rest.

Saturday: Time trial or competition.

Such archaic methods are unrealistic in any attempt to help an athlete approach his physiological best. Such a program is uninspirational; it lacks the incentive of a week-to-week graduated, progressively more difficult schedule. Worst of all, the 6¼ miles of running during the week is totally insufficient preparation for the rigors of Saturday's race.

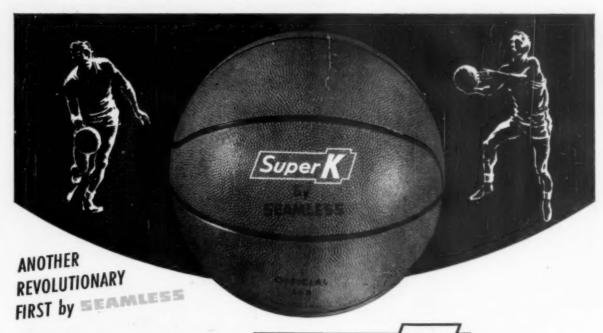
The finest dissertation on the subject of training can be found in Cross-Country Techniques Illustrated by Don Canham, track coach at the University of Michigan. The book is new, the ideas have proven successful, and the workouts are sufficiently vigorous to prepare the athlete for top-flight competition.

Initial moderation, a progressive program of physical training culminating in hard workouts within the powers of the individual boy, will bring him to a state of top physical and mental efficiency.

We're just beginning to see the possibilities of our young athletes. Enlightened training programs (that is, very hard work) are the major factors in modern-day record performances. The new horizons of "mind over matter" are in their infancy. Canham prophetically states:

The importance of the mind-overmatter principle is so great that most fine distance-running coaches today feel that the next great contribution in distance-running performances will not be made by coaches or trainers, but by physiol-

By JOHN A. LUCAS, Physical Ed Dept., University of Maryland



THE NEW Super K SERIES OUTLASTS, OUTPERFORMS ALL OTHER BASKETBALLS

PROVEN TOUGHEST OF ALL-



In grueling field tests of continuous play on school and gym floors...at camps and on playgrounds... on asphalt and concrete... leather and rubber balls were worn smooth to the groove, while SUPER K retained its pebble depth.



SUPER K proved 82% better than rubber in extensive laboratory tests of the effects of abrasion, sunlight, rain and snow, oxygen, ozone and ultraviolet light. PROVEN TOPS FOR PERFORMANCE.

SUPER K has the perfect feel and ideal tackiness which assure perfect fingertip control when passing, shooting or dribbling. Not a surface treatment, the feel is a characteristic of this new cover material. Long after high-priced, competitive balls have been discarded, a SUPER K is still in play with its original feel.



SUPER K bounces without a "ping" and meets the most exacting specifications for bounce or rebound from floor, backboard and rim.



PERMANENT IDENTIFICATION

Built-in identification is part of the cover, never wears off



ATHLETIC GOODS DIVISION

THE SEAMLESS RUBBER COMPANY

NEW HAVEN 3. CONM . U.S.A.



Field Seating that <u>eyes</u> and <u>huys</u> for the future



AVAILABLE NOW... "DUR-A-BILT" Bleachers Either portable or permanent ... with design and adaptability features that meet Tomorrow's needs—TODAY!

Outstanding Features Include:

- DESIGN...24" standard depth per row assures maximum comfort...ample space for spectator passage. 8" rise from row to row affords clearer visibility — units are easily expandable for future needs.
- © CONSTRUCTION . . . load-bearing members are 1/4" structural angular steel with joints electro-welded to form eneplace "Uni-Frame" panels. Foot and seat boards are select West Coast Douglas Fir, double coated to retard deterioration.
- FINISH . . . by Hot Dip GALVANIZING all steel members after fabrication rust is stopped at manufacturing source. This eliminates costly painting and scraping operations in the future. GALVA-NIZED Bleachers are available at a medest additional cost.

Contact your PLAYTIME dealer now for further information... or write direct for FREE literature.



ogists and psychologists as they show us a practical method for men to overcome mental barriers that we know limit performance. What we today regard as physical fatigue in the well-trained athlete may by tomorrow be regarded as merely preliminary tiredness the difference between greatness and near greatness is often merely the state of mind.

Our high school boy has greater demands on his time than ever before. School work, after-school jobs, homework, the myriad social functions which are taken so seriously, the attractiveness of television, auto driving, dates, movies, and latehour drive-ins make it necessary for our youth and their parents to reappraise their sense of values.

The following program of cross-country training, with its inferred objective of serious running indoors and outdoors, would put school and track athletics, in that order, as the two most important activities in a young man's high school career. These suggestions should be considered just one method that has worked successfully in coaching individuals to local, state, and New England Championships.

At all times the needs of the individual boys should be paramount in the coach's mind. The 38 workouts, excluding races, are divided into 15 sessions during September, 15 during October, and 8 crucial workouts in November in preparation for championship meets.

Four basic "types" of workouts are repeated from week to week. They are: Overdistance (O.), Speed (S.) repeat 220's on the track, "Fartlek" (F.), and Pace (P.).

Early Season Training—September— 15 Practice Sessions:

Many small groups of enthusiastic boys, during the cool of August evenings, anticipate the coming competitive seasons by jogging easily through the woods or on grass. Formal training should begin the first week of school.

Nos. 1-5: Overdistance—jog leisurely 35-45 minutes, stopping at times

No. 6: Speed—warm-up one mile. Run 6 x 220 yards in 35 seconds with slow 220 jog-walk in between.

slow 220 jog-walk in between. No. 7: "Fartlek"—30 minutes with three "accelerations" of 100 yards uphill, three "bursts" of 50 yards, and one long walk in between.

No. 8: Pace—jog one mile. Run two half-miles over cross-country course at near racing speed (2:40-2:50). Jog and walk for 10 minutes in between.

No. 9: O.—30 m. continuous running. Rest. Run 110 y. in 14 sec.

No. 10: S.—warm-up one mile. Run 8 x 220 in 35 s.

No. 11: F. 40 min. as follows:

(a) jog 10 min.

(b) accelerate for 2-3 min.

(c) walk 200-300 yards

AUTHOR John A. Lucas graduated from Boston U. in 1951 and received his masters degree from USC the following year, where his thesis on the use of "fartlek" and "interval training" methods for American distance runners was perhaps the first lengthy dissertation of its kind in this country. In five years of coaching at Huntington Prep (Boston) and Natick (Mass.) H. S., his teams won 100 of 120 dual meets in cross-country, indoors and outdoors, in addition to local, state, New England, and National championships. He has just joined the U. of Maryland as a graduate assistant in physical education.

(d) jog briskly 10 min.

(e) spurt 150 yards to nearby tree.

(f) jog 10 min.

No. 12: P.—jog one mile. Run 3 x 880 in 2:40-2:50.

No. 13: O.—35 min. continuous running. Run 220 in 30 s.

No. 14: S.—warm-up one mile. Run 10 x 220 in 35 s.

No. 15: F.—45 min. as follows:

(a) steady speed one mile.

(b) accelerate 100 y.(c) walk 200 y.

(d) repeat all steps three more times.

Mid-Season Training—October— 15 Practice Sessions:

No. 16: P.—jog 1½ miles. Run 2 x 1 mile at racing pace.

No. 17: O.—40 min. continuous running. Eun 300 in near 40 s.

No. 18: S.—w.u. one mile. Run 12 x 220 in 35 s.

No. 19 F .- 50 min. as follows:

(a) easy running 5-10 min.

(b) hard running for ¾ mile.

(c) walk 5 min.

(d) 10-15 min. easy running broken by many short "accelerations."

(e) walk 5 min.

(f) full speed uphill 250-300 y. No. 20: P.—w.u. thoroughly. Run 2 x 1¼ mile at racing pace.

No. 21: O.—45 min. continuous running. Run 390 in under 53 sec.

No. 22: S.—w.u. one mile. Run 14 x 220 in 35 s.

No. 23: F.-55 min. as follows:

(a) 10 min. jog warm-up.

(b) fast, steady running for 3/4 to 11/2 miles.

(c) walk and jog for 10 min.

(d) 3 or 4 long "wind-sprints."
 (e) easy running for 1-2 miles taking very short steps.

No. 24: P.—w.u. one mile. Run 3 x 1 mile at x-country pace.

No. 25: O.—50 min. continuous running. Run 440 in 62 sec.

No. 26: S.—w.u. one mile. Run 16 x 220 in 35 sec.

No. 27: F .- one hour as follows:

(a) jog briskly 10 min.

(b) stride 100 yards fast. (Continued on page 66)

... for the 4th time

Congratulations CHAMPS



A happy group surrounds a happy trio. Left to right: Star center Ed Beck, Governor A. B. Chandler, Coach Rupp.



Coach Rupp here isn't any happier than these seven Kentucky cheerleaders, after winning the 1958 NCAA.



Seated, left to right: Head Coach Adolph Rupp, Harold Ross, Bill Cassady, E. A. Couch (no longer on team), Adrian Smith, Lincoln Collinsworth, John Crigler, Earl Adkins and Assistant Coach Harry Lancaster. Standing, left to right: Assistant Coach Bill Wireman, Vernon Hatton, Johnny Cox, Dick Howe, Phil Johnson, Ed Beck, Don Mills, Bill Smith and Manager Jay Atkerson.



On the verge of victory, Rupp finds it impossible, here in the last few minutes of play, to contain his enthusiasm.



The game has just ended. Players, cheerleaders and spectators mill about in happy confusion.

Kentucky Wildcats Win 1958 NCAA Tournament!

For the fourth time Kentucky came through to win the most coveted crown in basketball. Underdogs all the way, the Wildcats whipped the University of Seattle in the finals, 84 to 72. Coach Rupp devised a brilliant defense for Seattle's Elgin Baylor, one of the nation's top scorers.

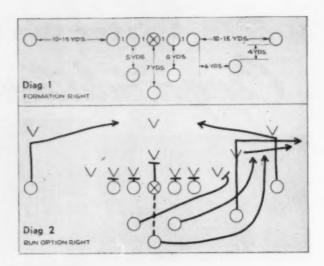


Head Basketball Coach of Kentucky for the last 28 years, Adolph Rupp says, "Year after year, I've specified that Seal-O-San be used on our gym floor. I've recommended it hundreds of times to schools asking me to recommend the best gym floor finish. The fact that we won the NCAA is tribute enough to Seal-O-San, I think."

SEAL.O.SAN

HUNTINGTON LABORATORIES, INC. # Huntington, Indiana . Philadelphia 35, Pennsylvania . Toronto 2, Ontario

SPREAD-OPTION ATTACK



By ANDREW GRIEVE, Coach, Central School, Sherburne, N. Y.

URING the middle of the season a few falls ago, we were placed in a peculiar position. Due to injuries and other factors beyond our control, we were forced to search for a new offensive pattern which had to be simple, readily learned, and yet effective. Quite a challenge.

In meeting this challenge head on, we resorted to the cliche, "Something old, something new, something borrowed, etc." Of course, we hoped we wouldn't end up being blue!

The "something old" was the spread, which has been around for decades, while the "something new" was the option, that being the latest trend in football—the split-T option, the belly option, the drive option,

and the pass-run option. This was the beginning of our "spread option" offense.

Other teams may have run similar patterns, but few have run the majority of their plays as pass-run options. When our team lined up in the spread option formation, no one on the field, including ourselves, knew whether the play would be a run or a pass.

The formation itself is rather similar to the old short punt (Diag. 1). The center, tackles, and guards line up split a yard apart, while the ends split between 10 and 15 yards from the tackles—the distance being determined by the lateral location of the ball on the field.

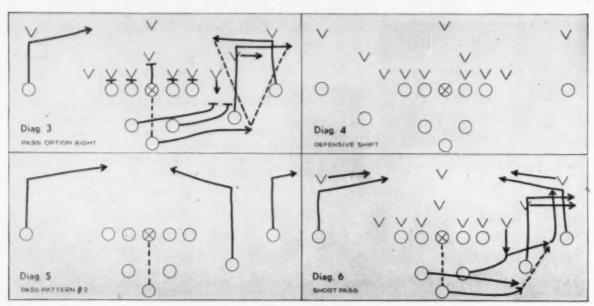
One back locates in the slot between the tackle and the end, about six yards from the tackle and four yards from the line of scrimmage; the two up-backs set five yards directly behind the guards; and the tailback plays seven yards directly behind the center.

Diag. 1 illustrates the basic formation to the right. On formation left, the only difference is the shifting of the slot back to the left.

Now to the option play itself. The ball is snapped to the tailback, who starts to his right. The two up-backs move out in front of him to lead the play, while both ends sprint straight downfield approximately 15 yards and slant to the middle.

The slot back trails the right end, and after 10 yards he breaks sharply to the right into the deep flat. The tailback, behind his two blockers, must rapidly discern the defensive adjustment.

With the five interior linemen



Any action is welcome

on Kreolite Gym Floors with the Built-In Cushioned Flex

Typical gym floors are subject to many kinds of activities, some of which can mar and scar ordinary flooring. But, with Kreolite Flexible Strip End-Grain Wood Floors, you have flooring that welcomes any kind of action and retains its original beauty.

Durable Kreolite gym floors are also noted for their extra resiliency which makes them kinder to feet and less fatiguing. Besides being easier on the feet, Kreolite floors are also much easier on school budgets because they require less maintenance and last longer.

Write today about new Kreolite installation or replacement floors.

KREOLITE FLEXIBLE STRIP

THE
JENNISON-WRIGHT
CORPORATION
TOLEDO 9, ONIO

ALL-AMERICAN HEAVY-DUTY UNIFORM HANGER



Faster, More Thorough Drying . . . Much More Hygienic and Efficient Handling For All Athletic Gear

Accommodates all of a player's football, basketball or baseball gear, solves the old problem of drying and storing sweat-soaked equipment. Ruggedly made—extra heavy steel rod, electrically welded into a strong, one-piece unit. Molten tinned finish protects permanently against rust and the corrosive action of perspiration.

Each, complete with Number Plate, f.o.b. our Texas Mill \$1.70

write for literature featuring american approved jim patterson LIFETIME Aluminum DIVING BOARD world's finest official board



blocking the defensive men closest to them and the pass receivers pulling the secondary deep, the tailback quickly sees if the two backs leading the play can clear out the remaining defensive players. If they can, he will run. If the defense appears too strong, he will fade and pass.

If the tailback decides to run, we have him call "break" and the backs leading the play will proceed downfield.

As we mentioned previously, this play is strictly an option. Even the tailback doesn't know whether the play will end up as a run or a pass—not until he quickly sums up the defensive reaction.

To meet the spread, the defense must spread with it. Some defenses will react to the passing situation and leave themselves wide open for the run. Others will react slowly to the spread, leaving themselves vulnerable to the pass.

It's difficult to predict which way a defense will react. The decision on the option will rest with the tailback, and it will be of inestimable value to have a rather intelligent and quick-thinking player at this position.

Diag. 2 illustrates the run option to the right and Diag. 3 the pass option to the right. Naturally, the same plays may be run to the left.

DEFENSIVE REACTION

Any explanation of the defensive reaction would only be a supposition on our part, as we've seen so many varying adjustments.

An example of such a reaction is shown in **Diag. 4**. One linebacker slides to cover the slot back, the halfbacks cover the ends, and the line plays slightly loose. With such a set-up, a good block by either of the up-backs on the end should shake the ball-carrier free.

We've also adjusted our pass pattern to vary the attack somewhat. The end will break out and the slot back in. **Diag.** 5 illustrates this pattern to the right.

Another variation used effectively against teams which cover our spread men man-to-man is the short pass to one of the up-backs. He'll fake a block on the defensive end and break to the flat, after the spread men have pulled the secondary downfield. **Diag.** 6 illustrates this.

Some opponents forego the inside defense and concentrate on the pass defense and the wide option run. To counteract this and keep the defense honest, we added the plunges.

On one plunge, we snap to the

Diag. 7
Plunde Best

Diag. 8
Plunde LEP1

up-back on the side of the slot back (Diag. 7), and on the other we snap to the up-back on the opposite side (Diag. 8).

Some defenses slide the line-backer on the slot side to cover the slot back, leaving a vulnerable spot on the strong side. Others will slide the other linebacker over to the strong side—thus the necessity for the weak-side plunge.

Actually, we have but four plays from the right formation and four from the left. Not very many, but they do put a great deal of pressure on the defense.

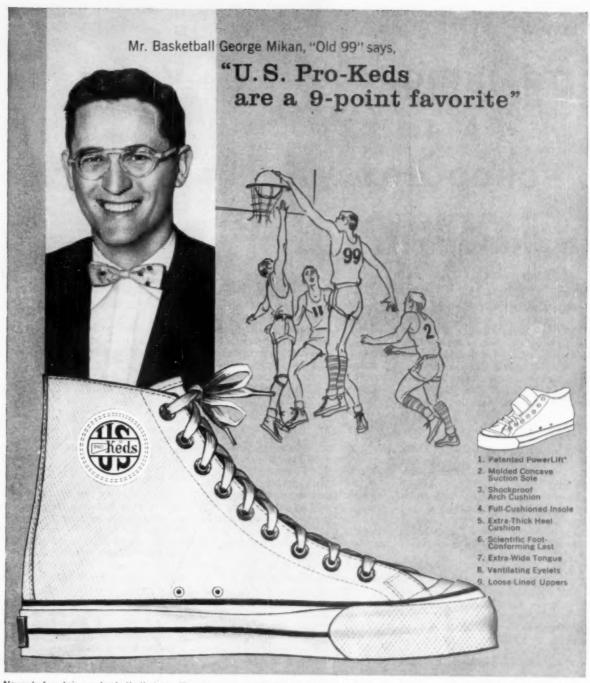
After using this spread option during our high school season, we were surprised to see the Chicago Bears utilize a similar formation in their playoff with the New York Giants at the end of the 1956 season. The Bears slotted two backs and used it mainly for passing, although they did include plunges by the up-back.

We had a great deal of success with this formation and have included it in our repertoire ever since. It's easily and rapidly taught, provides an excellent change of pace, and should create problems for the defense. A strange type of formation, being difficult to defense and easy to make mistakes against, is usually a thorn in the side of the defense.

FOOTBALL FATALITY REPORT

NOW available for free distribution to administrators and coaches is the 26th Annual Survey of Football Fatalities (1931-1957) prepared for the American Football Coaches Assn. and the NCAA Football Rules Committee by the Committee on Injuries and Fatalities, Dr. Floyd R. Eastwood, chairman.

The report may be obtained by writing to Mr. D. O. McLaughry, Secretary-Treasurer, The American Football Coaches Assn., Box 1083, Hanover, N.H.



Never before has any basketball shoe offered so many scientifically designed features to increase player safety, sure-footedness and comfort. That's why U. S. Pro-Keds are the odds-on favorite of coaches, physical educators and trainers throughout the country.

Pro-Keds protect the player against severe shock with an extra-thick heel cushion, a full-cushioned insole and a shockproof arch cushion. They allow safer starts, surer stops with an even-wearing molded suction sole. And now, with patented PowerLift—a firm elastic harness that keeps foot and shoe together—Pro-Keds actually let the player use all of his native speed and maneuverability with maximum safety.

*Optional—also available in "Low-Cut"



The Shoe of Champions.

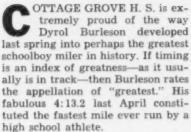


United States Rubber

Rockefeller Center, New York 20, N.Y.

TRAINING A 4:13.2 SCHOOLBOY MILER

By SAM BELL, Track Coach, Oregon State College (formerly of Cottage Grove H. S., Ore.)



Dyrol, who turned 18 two days after he broke the national record, stands 6-1, weighs about 157 pounds, and runs like a beautifully coordinated machine. Now anytime a super youngster explodes into the national headlines, it's both interesting and informative to trace his development and delve into his workout schedules. That is the purpose of this dissertation.

As an eighth grade student at Jefferson Junior High in Cottage Grove, Dyrol participated in track. But his lone event was the high jump. In this event, he cleared five feet as an eighth grader.

As a freshman at Cottage Grove High School, he switched to the mile and 880. His first competitive mile as a freshman came early in April, and he ran 5:04. He worked hard during this track season, and in the district track meet (as a freshman) he ran 4:43.2, placing third to the eventual state champion, Mark Robbins of Roseburg. As a freshman, he also ran a 2:11 half-mile.

His workout schedule was based on interval training and the fartlek principle. His interval training consisted of eight to ten 440's from 70 to 75 with a 440 walk in between per day. For his fartlek work, he ran a three-mile cross country course about twice a week.

DICUT

As a sophomore, his first competitive mile was about 4:48. In the district track meet that year, he placed second behind Al Brickson of North Bend, the eventual state champion. His time, 4:33.4. He also placed second in the district 880 in 2:03. At the state meet, he placed fifth in the mile.

During his sophomore year, Dyrol did more interval training and less fartlek. He ran fartlek one day a week and ran eight to ten 440's with a pace from 68 down to 62. He also ran 220's with a pace at 34.

As you can see, Dyrol developed beautifully as a freshman and sophomore. Wally Ciochetti was his freshman coach and then his head coach as a sophomore. He did a tremendous job of helping the boy develop.

When Dyrol entered his junior year, I began working with him. In his workout plan, he ran fartlek only once every two weeks and ran from 8 to 12 pace laps a day in his interval training. His 440 pace in late March was 67 with a 440 rest in between. We moved this down to 64 seconds with a 220 rest in between at the season's end.

Since Dyrol had lost both the mile and the 880 in the district track meet as a sophomore, due to someone else having more kick down the stretch, we felt that some speed work was necessary to strengthen this part of his race. Consequently, we had him run progressive relays with our sprinters plus 220's at pace from 28 seconds to 33 seconds.

We added this latter work because we found his pace varying from his first 220 to his second on different laps of his races. We also worked on 110's from 14 seconds to 16 seconds

Courtesy Track and Field News

so he could judge the speed of the start of his race.

In his first competition in 1957, he ran a 3:16 three-quarters and a :54 quarter. Then his times came down like this:

		Mile	880	Opponent
March	29	4:34.4	2:04.4	Roseburg
April	5	4:29.4	2:03.7	Eugene
April	9	4:27.8	2:05.4	Springfield
April	13	4:25.1	1:57.3	Hayward Rel.
April	20	4:39.6	2:05	Marshfield
April	26	4:24.4	2:01.3	Douglas
May	4	4:48.8	2:01.2	Sub. Dist.
May	11	4:25.3	2:00.2	Dist. 5 A-1
May	18	4:29.3	2:02.5	State H. S.
May	25	4:28.4		State AAU

I feel that any boy who desires to be a distance runner could learn lots of valuable lessons from Burley. He will do anything he's told by his coach, and he knows you must first warm up before you run a race which is one of the biggest weaknesses in high school runners.

He's very sensible about not letting his ability go to his head, yet doesn't put on any airs of false modesty. He's a team leader and works with and encourages the younger kids constantly.

This, of course, has paid off on our track squad, for we have lots of kids with an intense interest in track, especially in distance running. We had a sophomore who ran 4:42 last year, a frosh who ran 4:48, and two juniors and a sophomore who ran 4:50.

In almost every case, these kids were carried beyond the limits you would normally expect of them because of Burley's leadership and drive

As a coach, I learn a lot more about track every year. But when I get a kid like Dyrol in a given event, I learn even more because I feel a

SCHOLASTIC COACH



FREE PLAY WITHOUT ACCIDENTS

New Safety for Active Play Indoors or Outdoors!



101 FAMOUS GAMES
PLAYED IN NEW SAFETY

Baseball, Softball, Hockey LaCrosse, Tennis, Basketball and Scores of Other Games

A few Scoops and Fun Balls (both Softball and Baseball sizes) provide equipment for scores of different, interesting and active games. All are based on famous games. All are adapted to be SAFE in spite of congested playgrounds or confined areas . . . even for indoor play, Write to Cosom Industries, Inc., for diagrams and descriptions of these new games. No cost, no obligation.

COSOM



Perhaps the most important advantage of the use of Polyethylene for play equipment is the near impossibility of accidents; particularly the head injuries that are so frequent. Wounds, bruises and fractures are practically eliminated with Polyethylene equipment.

The many, active ball games that are played with Safe-T-Play products invite much of the "rough and tumble" children enjoy; yet the carefully observed play of some hundreds of children during the past summer did not result in anything more serious than occasional stings when an enthusiastically swung Scoop or Safe-T-Bat struck another player.

The lightness and resilience of Polyethylene result in safety of great importance to the supervisor or instructor with many children to safeguard . . . and at the same time to keep busy in healthy, active play.

FUN...with SAFETY!

ON PLAYGROUNDS...IN GYMS ALL CONFINED, CONGESTED AREAS





All Cosom Safe-T-Play products (except the soft rubber regulation type bowling ball for Bowlite, the Polyethylene bowling game) are made of light, resilient SAFE Polyethylene. Fun Ball is made in softball and baseball sizes. Safe-T-Bat is a regulation size 30 inch bat—so light even first graders swing with good form and coordination. Ask your school supply dealer or write to Cosom Industries, Inc. for complete details.

INDUSTRIES, INC. MINNEAPOLIS 16, MINN.

in the MOUTH!

America's No. 1 Mouthguard protected 85,000 football players in 1956 without a single dental injury or one lip laceration



Mill-Mont Mouthguard worn with tubular bar for complete nose-teeth protection.

FIVE BIG FEATURES

- Mill-Mont Mouthgard is a comfortable surgical rubber device that affords 100% protection internally and externally.
- Can be worn with or without tubular bar or other face equipment. Attached to chinstrap, does not interfere with helmet nor impede other face protective equipment.
- Fits any dental structure, provides solid bite when needed, protects teeth, gums, lips.
- No gagging or discomfort. Has a hole like a whistle. Breathe through it, speak through it. No cumbersome denture to gag on.
- No danger of swallowing, ejects itself automatically when player is knocked out.

BREATHE THROUGH IT SPEAK THROUGH IT





See sporting goods dealer or write:

MILL-MONT COMPANY

510 W. First St., Long Beach 2, Cal.

Sold by: A. G. Spalding & Bros.—Wilson Sporting Goods Co.—Rawlings Sporting Goods Co. —Laws and Campbell—E. C. "Mule" Frazier Associates.

SUN DAY 4/13	1	2ъ	11						
MONDAY 4/14	1	8-10 4c	4-6 5g	11					
TUESDAY 4/15	1	3-5 8f	3	11					
WEDNESDAY 4/16	1	9f	11						
THURSDAY 4/17	1	Run into 3 to 5 220's for time trials					2ъ	11	
FRIDAY 4/18	1	3	11						
SATURDAY 4/19	1	Marshfield Dual Meet Run 440 & 880 in competition						11	

SAMPLE OF DYROL BURLESON'S WORKOUT SCHEDULE FOR WEEK OF APRIL 13-19

- Warmup run—include arm and shoulder work (rope, rings, apparatus) and abdominal and back regions.
- 2. Fartlek-(a) 20 min., (b) 40 min., (c) one hour.
- 3. Light Fartlek.
- 4. Repeats—220 in (a) 35, (b) 33, (c) 31, (d) 29, (e) 28, (f) 27.
- 5. Repeats—440 in (a) 75, (b) 72, (c) 70, (d) 69, (e) 68, (f) 65, (g) 64, (h) 63, (i) 62, (j) 61.
- 6. Repeats—880 in (a) 2:40, (b) 2:35, (c) 2:30, (d) 2:25, (e) 2:20, (f) 2:16, (g) 2:12, (h) 2:08, (i) 2:05.

responsibility to do as much for him as possible.

Dyrol sets goals for himself and strives to attain them. In 1957 his goal was a 4:24 mile and a state championship. He, of course, fell just short of both goals. Last year his sights were again set on a state championship and he wanted to break the existing national interscholastic mile record. He had lowered his best time by approximately 10 seconds each of his two varsity years, and in his senior year had lowered his best time by 11 seconds.

On March 14 of this year in time trials, Dyrol ran a 4:21.8 mile and came back with a 1:59.2 half, 40 minutes later. This was in 45° temperature.

On March 29 at the Roseburg Invitational, he ran a 4:26.6 on a track that was half under water and four inches deep in spots. Forty minutes later he ran a:53.8 quarter.

On April 5 Dyrol ran in an open mile at the Willamette Relays, becoming the first high school runner to ever enter the race. Previous winners had been Bill Dellinger, University of Oregon, in 1956 and 1957. Dyrol won the race in 4:16.9. His lap times were 64.5, 65.8, 65.5 and 60.1. His pace was to have been 65's and then to come in as fast as he

- 7. Repeats—¾ in (a) 4:00, (b) 3:45, (c) 3:39, (d) 3:33, (e) 3:27, (f) 3:23, (g) 3:18, (h) 3:12.
- 8. Sets 660-440-220--(a) 2:00-:75-:38, (b) 1:55-;73-:36, (c) 1:50-:70-:33, (d) 1:45-:68-:31, (e) 1:40-:66-:31, (f) 1:37-:64-:28, (g) 1:33-:62-:27, (h) 1:30-:60-:26.
- 9. Bunches—2 or 3 660's, 4 to 6 440's, 8 to 10 220's—using same times as in 8 (a), (b), (c), etc.
- 10. Parlauf Relay.
- 11. Run out after each competition or workout.

felt capable of on the last lap.

On April 12, Dyrol competed on three relay teams in the Hayward Relays at the University of Oregon.

At 3:00 p.m., he ran a 1:54.7 half mile anchor leg on the two-mile relay team.

At 4:00 p.m., he ran a 4:26.4 mile anchor leg on the distance medley team.

At 5:00 p.m., he ran a :51.7 quarter anchor leg on the mile relay team.

All three teams were victorious! On April 25 at the Corvallis Invitational, Dyrol broke the national interscholastic mile record with an astounding 4:13.2. The second place runner came in at 4:35.

Dyrol's lap times were 61, 64, 66, 62.2. His 220 times were 29, 32, 32, 32, 33, 33, 30, 32. His race plan had called for a pace of 64's. While he hadn't planned for an all-out mental effort for this race, he decided to go for it when he realized he was that close

On May 2 in a night meet at Cottage Grove, Dyrol ran a 4:16.2.

On May 15 in our sub-district meet, he ran a 1:55.7 half and a 4:41 mile in which he lagged back doing a coaching job on two of our younger runners.

On May 24 in our district meet, (Concluded on page 63)

Leather or Rubber-

SPALDING BASKETBALLS OUTLAST EM ALL!



Leather

Treat your team to the Spalding Top-Flite #100. It's hand-crafted of top-grain cowhide—tanned as only Spalding knows how—so it keeps its "tackier" feel, gives your players greater confidence in their game.

Inside, a lively butyl bladder and four layers of fabric insure perfect roundness game after game.

No wonder the Spalding #100 is the official basketball of the Ivy League . . . official for all Big Ten televised games.

And—many features of the Top-Flite #100 are available in the PL-10, a Panel-Lock leather basketball for high-school and college play.



Rubber

Spalding's new rubber-covered #160 has exclusive "Ny-Weave" construction.

Spalding takes tough nylon, resilient rubber, and cushioning fabric—fuses them together under tremendous pressure to make a perfectly round, incredibly tough single piece.

Result—a basketball made tough as a truck tire—in fact, the longest-lasting rubber-covered basketball ever known.

The Spalding #160 survived 45,921 tortuous cycles on the rebound machine in our laboratories—far more than the best competition!

Have our Spalding representative show you both of these great basketballs soon. Like all Spalding products, they are guaranteed—unconditionally.



APPROVED PROCESSORS FOR



ABITONA

Fidelity Film Company 315 Englewood Rd., LITTLE ROCK Jet Film Productions, Inc. 1802 Rice Street, LITTLE ROCK

CALIFORNIA Egon Productions - Labor P.O. Box 734, BERKELEY TO these Acme Filter Laboratory, Inc.
116.1 N. Highland Ave., MOLLYWOOD Varsily Film Lab
221 West Clinion St., 1THACA
6060 Sunset Blvd., MOLLYWOOD
Royal Dak Telepotister
423 Leaf StDn St., New YORK
423 Leaf StDn St., New YORK Cine-Craft 8764 Beverly Blvd., LOS ANGELES 8795 neverly Bird , LUS ARGELES 17 West 45th St., NEW YORK Ackerams Film Laboratories 9 Lab. 17 West 45th St., NEW YORK 4683 Shattack Are. QARLAND 9 Lab. 17 G. 27 West 45th St., NEW YORK 1405 Sh Are., Rm. 302, SAN DIEGO Victor Film Laboratories 1405 Sh Are., Rm. 302, SAN DIEGO Victor Film Laboratories 132 Golden Gate Ave. Since Film Laboratories 347 FRANCISCO NAF FRANCISCO NAFARA FALLS NEW YORK 19 NAGARA FALLS

Multichrome Lab., Inc. 760 Gough St., SAN FRANCISCO COLORADO

CONNECTICUT ne Video Production, Inc. eston Post Rd. at Cedarhurst La. DIST. OF COLUMBIA

Byron, Inc. 1226 Wisconsin Ave., N.W. WASHINGTON 7 Co-op Film Facility 1271 First St., S.E., WASHINGTON McGreary Film Service 516 Rhode Island Ave., N.E. WASHINGTON 2 National Cine Laboratories P.O. Box 4425, WASHINGTON 17 FLORIDA

Clark Films 1134 N.E. 1st Ave., FT. LAUDERDALE Russell Barton Film Co. 4853 Walter St., JACKSONVILLE Reela Films, Inc. 17 Northwest Third St., NUXXIII

GEORGIA Color Graphic Division of Graphic Films, Inc. 3184 Roswell Rd., ATLANTA Strickland Films, Inc. 220 Phare Rd., N.E., ATLANTA ILLINOIS

George W. Colburn Laboratory, Inc 164 N. Wacker Drive, CHICAGO 6 Film Services, Inc. 119 West Hubbard St., CHICAGO Fischer Photo Laboratories 6555 W. North Ave., OAK PARK Solar Cine Products, Inc. 4247 South Kedzie Ave., CHICAGO Superior Bulk Film Co. 442 North Wells St., CHICAGO Mr. Paul Heinburger

INDIANA obert Young Studios ISO South Holt Rd , INDIANAPOLIS

HANSAS KENTUCKY Wallace Photo Service 131 West Main St., LOUISVILLE

LOUISIANA MARYLAND

MASSACHUSETTS The Phoure Studios
782 Commonwealth Ave., BOSTON
Lester E. Bernd
Photo Service Laboratories
11 Comeau St., WELLESLEY HILLS

MICHIGAN General Film Laboratory, Inc. 66 Sibley St. DETROIT

MINNESOTA tional Camera Exchange South 6th St., MINNEAPOLIS Sty Fox Films, Inc. 627 First Ave., North, MINNEAPOLIS F MISSISSIPPI

Jasper Ewing & Sons 727 East Pearl St., JACKSON MISSOURI Calvin Company 1105 Truman Rd , KANSAS CITY E.S. O.S. Pictures 1121 West 47th St. KANSAS CITY 12

Studna Film Laboratory 3214 Gillham Plaza, KANSAS CITY

NEW JERSEY Nier Film Labs 18 Mountain Ave., BOUND BROOK NEW YORK

Arca Movie Films 86-16 Fourth Ave., BROOKLYN U. S. Photographic Equipment 442 Rogers Ave., BROOKLYN Holland-Wegman 197 Delaware Ave., BUFFALO Kin-O-Lux, Inc. 17 West 45th St., NEW YORK Niegara Phototechn 1271 Wyoming Ave NIAGARA FALLS

Black Studio, Inc. 254 Ferry St., SCHENECTADY OHIO The Camera Shop 242 Fast Main St., ALLIANCE Allen Camera Shop 935 Wheeling Ave., CAMBRIDGE Marathon Movie Lab 2436 Vine St. P.O. Box 6 CINCINNATI 19

Laboralt International Corp. 4019 Prospect Ave., CLEVELAND 3 John R. Bennett 1617 Aberdeen Ave., COLUMBUS ilm Associates, Inc. 500 South Disie Hwy., DAYTON 9 Film Processing Service 885 Tenth St., N.E., MASSILLON OKLAHOMA

Dwight Morris 1611 South Boston, TULSA OREGON

Ben G. Fleischman 7347 S.E. 29th Ave., PORTLAND PENNSYLVANIA Commercial & Mome Movie Service 727 North 19th St., ALLENTOWN North Aflerican Films 106 East 10th St., ERIE Harold W. Beswick 1017 W. Allegheny Ave., PHILA 33 Newsreel Lab 1733 Sensom St., PHILADELPHIA Quick Photo Service 2601 Wharton St , PHILADELPHIA

Packaged Programs, Inc. 634 Penn Ave., PITTSBURGH 22 Warren R. Smith, Inc., 117 Fourth Ave., PITTSBURGH 22 Michael Goga & Co., R.D. No. 1, SHARON SOUTH CAROLINA

Southeastern Film Processing Co 1305 Geiger Ave., COLUMBIA 2 Graham Photo Supply 11 Hammond St., GREENVILLE SOUTH DAKOTA Marold's Film Photography 308 S. Phillips Ave., SIOUX FALLS

TENNESSEE Disie Films 738 S. Cooper St., MEMPHIS Motion Picture Laboratories, Inc. 1672 Union Ave., MEMPHIS

TEXAS Film Aide Company 509 Harrison, AMARILLO Big D Film Lab 4215 Gaskin Ave., DALLAS Southwest Frim Lab, Inc. 2015 Young St., DALLAS Southwest Graphics, Inc. 3904 Pershing Drive, EL PASO Bob Bailey Productions 515 Taft St., HOUSTON I, SHREVEPORT

LANCO

By Laboratories

ata Rd. HYATTSVILLE

MCCHUSETTS

Im Laboratory, Inc.

BOSTON

C. L. Stockdale, Photo Tech Lab.

729 W. Statt South,

Worselth Ave. BOSTON

SALT LAKE CITY

Wally's Color Prints 167 State St., SALT LAKE CITY

VIRGINIA Maycox Photoramic, Inc. 732 Mushogee Ave., NORFOLK TV & Motion Picture Productions 117 East Main St., RICHMOND Perdue Cinema Service Box 671, R.D. No. 9, ROANOKE WASHINGTON

orde Motion Picture Lab Lloyd Bidg., SEATTLE WEST VIRGINIA The S. Spencer Moore Co. 118 Capitol St., CHARLESTON Carr Photo Service 3393 Main St., WEIRTON

WISCONSIN Central Film Laboratory 1020 North Fourth St., MILWAUKEE

How About 8-mm. Film for Your Game Movies?

By HAROLD HAINFELD and DICK FLANAGAN

AST December saw a general increase in the cost of both moving picture film and the processing of it. There have been other cost increases in the athletic budget, and athletic directors and coaches are now trying to hold the line with these cost hikes.

Nobody wants to cut back on his football moving-picture program. Coaches agree on the values of slow-motion analytical movies. (See "Tips from the Top," Scholastic Coach, January 1958.) What can be done to combat rising costs?

One possible answer lies in shooting your games with 8- instead of 16-mm. film. A large savings is thus possible. Let's analyze why most high schools are shooting their games with 16-mm, film.

First, because of the easy accessibility to a 16-mm. projector. This sound projector is standard equipment in the audio-visual program of our secondary schools, and with such equipment readily available the coach would naturally want to photograph his games with a film (16-mm.) that would fit the projec-

The limitations of the sound projector is fairly evident, however. For one thing this projector can operate at only two speeds - 24 frames a second and 16 frames a second. It's impossible to slow these projectors to lower speeds for slower analysis.

Secondly, many of these sound projectors don't have a mechanism that permits easy reversal of the film to reshow a play situation over and over. Result-more expense in the purchase of a 16-mm. analytical projector to permit slower projection and a switch to reverse the film.

Is the 16-mm. film really necessary? Again, analyze your own coaching situation. Look carefully at the places where you project your analytical movies.

Is a screen 5' x 7' adequate for your use with a squad of 35 or 40 players viewing the film? This is the size used by six schools of our acquaintance with 16-mm. film. The fact remains that this same size screen may be used for 8mm.

Another important point to consider is that the greatest technical advances of the past decade have been in the improvement of the 8-mm movie-making equipment. A number of 8-mm. projectors now on the market possess the features used for analyzing game movies-a reversing mechanism and a knob to slow down projection speed.

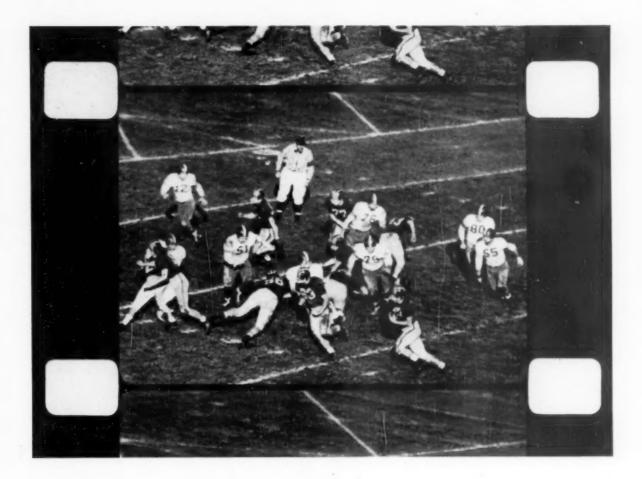
Kodak, Bell and Howell, Revere, and Keystone all manufacture 8-mm. projectors of this type, priced at about \$150. This is about half the cost of the 16-min. analytical type projectors. These 8-mm. projectors use a 750-watt bulb, the same illumination as with 16-mm. projectors.

It's thus possible to take and project analytical moving pictures at much less cost with 8-mm. equipment and the projection equipment furnishes almost similar results.

8-mm. cameras are built to take spools of "double-run" film. Only half the width of the film is exposed when taking pictures. After the film has been run through the camera once, the film on the retake reel is turned over and placed in the starting position and the other part is exposed.

(Concluded on page 59)

Scholastic Coach is presenting this article mainly as an idea to coaches who aren't using 16-mm. equipment but who are interested in photographing their practices and games. The reader should consider carefully how he intends to use his football films. If they're only to be used by the coaching staff for analytical purposes, the 8-mm. equipment may very well serve the pu: pose. But if the films are also intended to service large groups—the student body, the PTA, the booster club, etc.—the 8.mm. film and equipment may not prove suitable. It's impossible to project such pictures large enough (for these groups) without a great deterioration in the clarity of the picture. We suggest that the reader, before switching to 8-mm., check his local photographic dealer for advice and also have him project some 8-mm. and 16-mm. films so that he can see the difference with his own eyes.



Help them hold that line...with film!

The Dark Jerseys got through on this play to score the first TD of the game. The White Jerseys came through victorious in the end, but that first touchdown was pretty rough on morale both on the field and in the home stands.

The coach recorded the game on Du Pont Type 930 Rapid Reversal Motion Picture Film. The day after, he was able to show the squad how they looked in action during this play, to point out where they slipped and why the opponents' blocking was so effective. Going over the film closely gave his squad a new knowledge of their teamwork and timing. And next week, when they meet a new opponent, they'll be a harder-hitting team.

Coaches all over the country are using this modern training technique. Why not use movies as a coaching aid for *your* athletes to help you build winning teams for your school?

Du Pont Types 930 and 931 are ideal for recording sports events. You always get good, clear pictures, capturing every detail. You can shoot indoors or out, night or day, without special lighting. Types 930 and 931 can be processed fast—you can usually screen your movies within 24 hours. For more information and a list of processors qualified to give *extra-fast* processing, just mail the coupon.

On the opposite page is a list of firms equipped to process DuPont Rapid Reversal Films. Get in touch with the one nearest you.

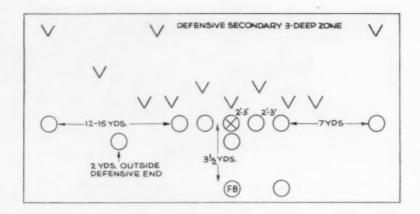
Du Pont Compo Wilmington 98	ony, 2432-A Nemours Building SC- , Deloware		
Please send me	ne complete data on Du Pont Rapid Reversal Motion Picture Film.		
	first of processors who offer extra-fast service with Du Pont film.		
Name	Title		
School_			
School Address			



Better Things for Better Living ... through Chemistry

By BILLY STONE Head Coach, Bradley University

as told to Fred Filip



Bradley's Loose Slot

N LINE with modern offensive thinking and the author's experience with the Chicago Bears, Bradley makes extensive use of splits, flexes, and flankers to lend versatility to its offense.

All in all, we can get over 30 different formations by flanking a halfback, splitting one or both ends, splitting one end and flanking a halfback on either side, or flanking the fullback and keeping the halfbacks put.

Since we always flank a back in the gap between end and tackle, our offense may be loosely termed a "slot" formation. But all the time and any time, we can run the Split T or the belly series from it.

We feel that the slot formation enables us to effectively spot and exploit the weaknesses of the defense, personnel-wise. The fact that we're spread and employ man-forman blocking quickly shows us who the weak defenders are.

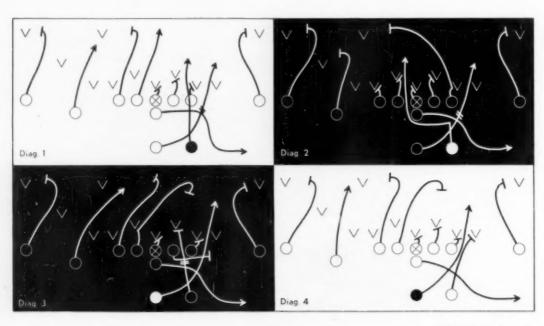
The slot formation also enables us to run Split T and belly plays without changing the position of our players. That's why this type of offense is particularly useful for small colleges which lack good players at certain positions, as well as over-all depth.

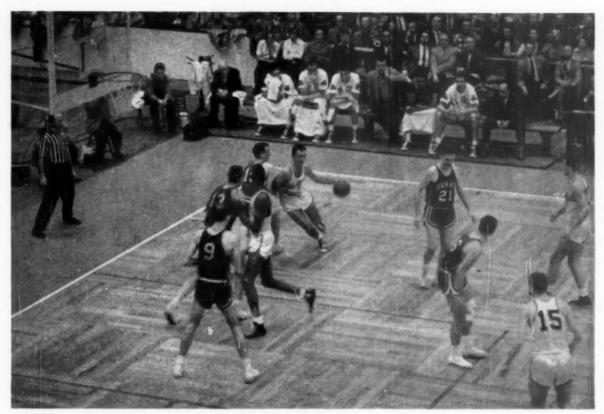
When the defense doesn't spread with us, we feel they're vulnerable

to outside running plays. If, however, the defense does spread with us, we feel it has weakened itself by dropping back ends or moving linebackers out to cover flanking men, or by leaving itself open for a running game up the middle.

In the slot formation, we're able to throw just as much strength to the weak side as to the strong side without jeopardizing our blocking angles.

We're also set to pass at any time, since our receivers are already out wide. By spreading our receivers, we're able to get a one-on-one situation, which often finds a good receiver taken by a weak defender.

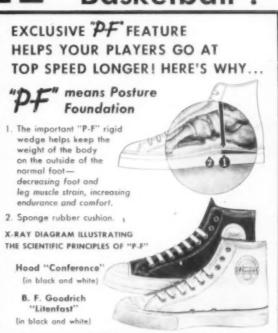




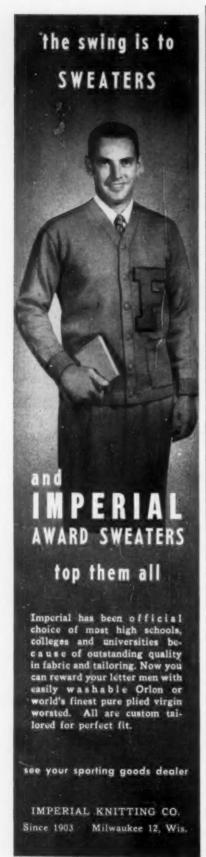
FREE MOVIE "Championship Basketball"!

Instructive, educational, entertaining film with demonstrations of fundamentals by the greatest stars in basketball . . . produced to help you build a winning team!

Now you can teach the fundamentals of winning basketball with the help of Bob Cousy and the world famous Boston Celtics. Out-of-bounds and other offensive plays, fast break drill, defensive maneuvers, rebounding, demonstrations of various shots—they're all here in this instructive and entertaining film, "Championship Basketball" (16mm., with sound, 28 minutes). See demonstrations by Bob Cousy, Bill Sharman, Tommy Heinsohn, Frank Ramsey, and Bill Russell . . . with comments and analysis by coach Red Auerbach. For free booking of "Championship Basketball" see your local "P-F" dealer or write B. F. Goodrich or Hood, Watertown, Mass.



"PF" Made only in B.F.Goodrich and Hood brands



In setting up, our guards have the option of splitting anywhere from one to three feet. The same holds true for the tackles. When we use the left halfback as the slot back between left end and tackle, as in the accompanying diagrams, the right end spreads 7 to 10 yards, depending on the speed of the defensive end. Since the right end will have to come back and take out the defensive end on certain plays, he must judge how many yards he can spread out and still be able to block the defensive end.

The left end spreads 12 to 15 yards, while the slot back (left halfback) adjusts his spread according to the position of the defensive end. He tries to set up a minimum of two yards outside the defensive end in order to have a blocking angle at all times.

The remaining backs line up approximately three and a half yards from the line of scrimmage in a three-point stance. At the beginning of the season, I let the boys get a comfortable stance and make them stick to it all year.

Now let's see how you can run from this formation (with the left half slotted to the left):

Diag. 1: The quarterback takes the snap, moves laterally down the line, and hands off to the halfback, who hits the line looking straight ahead. By looking straight ahead, he's able to move to his right or left according to the block of the tackle.

The fullback takes a lead step to his right and runs the off-tackle hole. The quarterback, after handing off, follows through with a fake to the fullback and then dashes to the right to fake a pass.

On this particular play, I prefer straight-ahead blocking.

Diag. 2 illustrates a counter play that works very successfully when we can hit and react with good mobility.

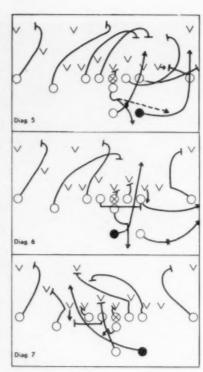
The quarterback comes down the line as though to hand off again to the halfback going straight ahead. However, this time he hands off as the halfback cuts behind him to the weak side. The quarterback follows through with a fake to the fullback and then drops back to fake a pass.

The halfback takes two steps straight ahead and then cuts sharply to the weak side. The fullback takes a lead step and fakes an off-tackle run.

Again the blocking is straightahead.

Diag. 3 is more of a four or five yarder than a touchdown play.

This time the quarterback fakes a handoff to the halfback, who goes into the line and blocks the line-



backer. The fullback takes a lead step, receives the handoff, and blows into the off-tackle hole.

The blocking now changes. We have our on-side guard pulling on the end, with the halfback filling in. Again the quarterback goes back and fakes a pass.

Diag. 4: The quarterback comes back at a 45° angle, hands off to the fullback, and follows through with a fake pass.

The halfback goes straight ahead two steps as if to take a handoff, then turns sharply to his right and blocks the defensive end. The fullback takes a lead step and blows into the off-tackle hole.

The blocking is straight-ahead.

Diag. 5: If the defense doesn't spread, we're able to toss to the outside with great success.

In this play, the quarterback makes a reverse pivot, pitches out to the halfback and fakes a handoff to the fullback, who runs inside tackle. After his fake, the qb drops back and fakes a pass.

The halfback bellies back a couple yards to give the interference a chance to pull and block for him. He's then in position to turn upfield immediately and pick up his interference.

The blocking is as follows: The right end takes the first man to the inside with a hard cross-body block; the right tackle pulls, screening the defensive end, and blocks the first man to the outside; the right guard

(Continued on page 52)

WANTS MOVEN NOFAMON NACTION



Almost every coach does...chances are you'd really like to have them too but cost has made the possibility remote.

NOW your cost problems are virtually eliminated with the introduction by WESTERN CINE OF HIGH SPEED 8mm EASTMAN MOTION PICTURE FILM.

It is now being sold nationally through qualified photographic dealers with our fast processing included. This means that you can take your own sports movies (day or night events) and have them processed and back in your hands in time to do some good. Our round-the-clock weekend processing (beginning September 1st), guarantees that your exposed film will be processed and on its way back to you in just a FEW SHORT HOURS!

HERE IS WHAT WE HAVE TO OFFER

8

PLUS-X ASA daylight 50 Tungsten 32

TRI-X ASA daylight 200 Tungsten 160

25' rolls \$3.05

25' magazines \$3.55

(Processing included)

SUPERSPEED 25' rolls \$3.55

ASA daylight 800 Tungsten 600

25' magazines \$4.05

(Processing included)

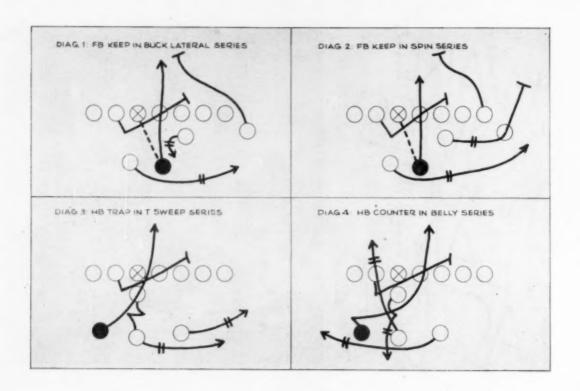
We can handle your 16mm sports film requirements too. The same fast, reliable service is available for 16mm Plus-X, Tri-X (negative or reversal) and 16mm Regular or Super Anscochrome.

Please see your dealer right away and ask him to stock up for your requirements...or...if your dealer doesn't yet stock our film, write to us. We'll be glad to serve you directly.



WESTERN CINE SERVICE, INC.

114 East 8th Avenue - Denver 3, Colorado - Telephone AMherst 6-3061



Roll Series from the Winged T

N DEVELOPING the multiple offense at Englewood, we've always been ready to plagiarize anything that appeals to us; and our new Roll Series represents an adaptation of one phase of the devastating winged T popularized by Delaware and Iowa. (Ed. note: This offense was outlined by its designer,

Dave Nelson of Delaware, in the September 1957 Scholastic Coach.)

However, where the Delaware-Iowa attack springs from a balanced line, we set up in an unbalanced formation. When using an unbalanced line, we're convinced that the guard trap offers the soundest blocking pattern, and in recent seasons

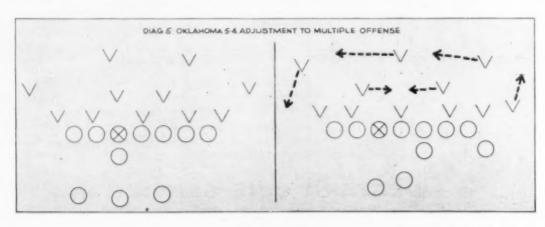
By GEORGE BALDWIN

Coach, Englewood (N. J.) High School

we've been hitting this opening with great success.

From the single wing, the fullback keep in the buck lateral series (Diag. 1) and the spin series (Diag. 2) have proved most effective, while the halfback trap in our sweep series from the T (Diag. 3) and the halfback counter from our belly series (Diag. 4) have also assisted us in exploiting this opening.

In our area, various forms of the balanced T constitute the most popular style of attack, encouraging extensive use of the Oklahoma 5-4 defense with inside linebackers. Since almost everyone employs this





RAIN OR SHINE . . . GET EVERY PLAY ON FILM

Whatever the weather, you're set to shoot with Kodak 16mm Movie Films

Murky overcast or dazzling sun, you can be *sure* of getting movies that catch all the action when you use the right Kodak film.

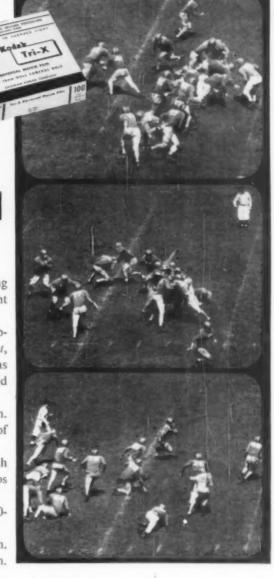
Take a day that's *gloomy* and dark. There's no light problem with Cine-Kodak Tri-X Reversal Film. It's extra *fast*, gives good results even in poor light. In fact, Tri-X Film has enough "speed" so you can shoot inside the gym or field house *without* special lights.

If it's a bright day, use Cine-Kodak Plus-X Reversal Film. This film gives you extra *sharpness* to pick up every detail of blocking and tackling.

And when you want the added impact of color, load with Kodachrome Film. The results are useful for alumni groups or student showings as well as team analysis.

You can get these fine Kodak 16mm Movie Films in 50-foot magazines and in 100- and 200-foot rolls.

So be set for any weather—with a supply of Kodak film. That's one way to be sure your movies catch all the action.





SHOOT 'EM WITH the Kodek K-100 Turret Camera. Gives you 40 feet (about 50 seconds of play at 32 fps) with a single winding. Turret holds three lenses to cover the action wherever you stand. Has variable speeds. Ruggedly built for years of good shooting.



SHOW 'EM WITH the Kodek Analyst II Projector. Built to coaches' specifications, this is the projector that puts crisp, clear movies on your desk and on the screen. Complete with table-top viewer, remote reverse control, and variable speeds to slow action for detailed study.

Get all the facts about the Kadak movie equipment and supplies that meet your needs. Write for FREE literature and names of processing laboratories in your area which provide special service for coaches.

EASTMAN KODAK COMPANY Rochester 4, N. Y.



defense against their T opponents, they don't like or haven't the time to concoct anything new for us. They've been content merely to adjust to our multiple offense (Diag. 5).

Upon discovering that the inside linebackers were in good position to plug our favorite openings, our first thought was to flow our backs to the short side to assist us in blocking the linebackers. However, we soon learned that the inside linebackers were too soundly coached to allow the backfield flow to decoy them from their keys on our linemen.

So we devised a Roll Series to fake the linebackers and thus open the gates for the inside reverse into the guard trap opening—our most productive play last year.

In running the Roll Series over set in a winged T by moving our left halfback up in a wing position outside our left end, leaving the other three backs in the normal T alignment.

This doesn't force a full rotation by the defense because we still have two running backs on the long side of the line. For this reason, we've made the off-tackle play our basic play in the Roll Series, forcing the linebackers to move aggressively to reinforce this area. We also run a power sweep to the short side to give the opponent the same defensive problem.

We run five different plays from this backfield action, known as the Roll Series. The following illustrations and explanations detail the mechanics of this series.

Diag. 6: Off-Tackle Play (Roll 23). The QB uses a reverse pivot, moves back and hands the ball to the right halfback at a point directly behind the center. He then fakes as if hiding the ball on his right hip and rolls out to the long side, keenly observing the action of the defensive men on that side.

The LHB double-team blocks with the left end if there's a man playing on the end's head. If not, he blocks in on the first linebacker to the inside, always making sure not to cross inside the lineman we're trapping.

The FB drives two steps toward the end and then blocks out on the second man outside the end.

The RH moves laterally and receives the ball from the QB directly behind the line of scrimmage. He then cuts upfield, running over the doubleteam block in the end's area.

The line blocks as indicated, which are the same assignments as prescribed in our regular blocking rules for the 3 (end) hole.

Diag. 7: Short-Side End Sweep (Roll 23 Wide).

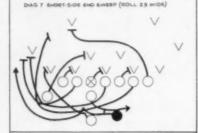
The QB assignment is identical to that on Roll 23.

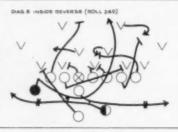
The LH takes the shortest route and blocks the first linebacker to the inside.

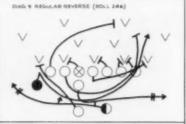
The FB drives two steps toward the left end and then swings out and blocks in on the first man outside the end. He doesn't run to get outside position on his man, but rather attacks him directly and then works for body position in his block.

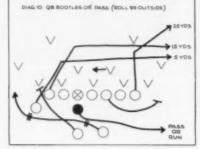
The RH moves laterally and receives the ball from the QB at a point directly behind the center. He takes one step and shoulder-fakes toward the 3 hole, then swings wide and fast around the short-side end. The line now blocks the assignments as prescribed in our rule blocking for the 3 wide hole.

BIAS & OFF-TACKLE PLAY (POLL 28)









Diag. 8: Inside Reverse (Roll 249). The QB carries out the same assignments as on Roll 23 and Roll 23 Wide

The LHB takes a jab step forward with his inside foot, then pivots back and runs an arc that takes him on a route over the double-team block of our right guard. The RHB hands him the ball forward at a position just to the short side of the center, and the LHB runs through the trap hole straight for the goal posts.

The FB drives straight at the left end and runs right through any defensive man in the end area. His movement is significant because it prevents the short-side defensive linemen from catching the play and it also shields the halfbacks' exchange from the linebackers.

The RHB moves laterally to receive the ball from the QB as on Roll 23 and Roll 23w. He runs on an angle toward the wingback and hands the ball forward to him. He then continues his fake to the outside. The line blocks the assignments as prescribed in our Rule Blocking for the 9 (right guard) hole.

Diag. 9: Regular Reverse (Roll 246). This play is executed exactly the same as Roll 249 except that the LHB now runs over the double-team which involves the 6 (outside tackle) man. The line blocks the assignments prescribed in our rule blocking for the 6 hole.

Diag. 10: QB Bootleg Run or Pass (Roll 99 Outside).

The QB begins this play the same as for the other four plays. However, this time he fakes the ball to the RHB, hides it on his hip, and rolls to the outside. He looks first for his right end free beyond the secondary. This end sprints straight downfield 10 yards, then breaks toward the flag on his side looking for the long pass. If the end isn't free, the QB passes to either of the other receivers or runs it himself, depending on which opportunity is permitted by the defense.

The RHB moves laterally, fakes getting the ball from the QB, and runs outside using a good fake.

The FB drives toward the left end and runs through the defensive man in that area to prevent him from catching the play.

The LHB sprints at the first line-backer to his inside and continues past to become a potential pass receiver 5 yds. downfield in front of the QB. If the QB chooses to run, he blocks. If the QB passes, he receives or blocks for the teammate receiving the pass.

The left end sprints across the field and becomes a potential pass receiver 15 yds. downfield in front of the QB. If the QB chooses to run, he blocks. If the QB passes, he receives the pass or blocks for the teammate receiving the ball.

The line blocks the same as prescribed in the blocking rules for the 9 hole, except for the 6 (outside tackle) man who rolls out to become a personal interferer for the QB.

(Concluded on page 67)



says A. C. "Whiley" Gwynne Head Athletic Trainer, West Virginia University President, National Athletic Trainers Association

"Like myself, hundreds of athletic trainers and coaches, as well as professional athletes throughout the U.S. and Canada, have turned to Cyclo-Massage® as the one best method to speed recovery of contact bruises, sprains and even 'shin splints.' I have known instances where this 'miracle of science' has cut recovery time for such injuries as much as 50%.''

combination of horizontal, vertical and circular motion which penetrates gently, soothingly throughout the body. But more important in the case of injuries, it helps increase blood circulation in the area of contact so effectively that a quick, noticeable reduction in pain and muscle spasm usually

Various types of Cyclo-Massage® training tables as well as portable units are avail-able for use at headquarters and while traveling. For full information, fill in and

OTHER PLUS BENEFITS OF CYCLO-MASSAGE® Many athletes profit from the use of Cyclo-Massage® in one or more ways from these well-authenticated benefits associated with it:

(1) Helps relieve pre-game nervous and muscular tensions (2) Helps induce deep, natural sleep in tense athletes

(3) Helps overcome excessive fatigue attributable to muscular activity

(4) Helps relax sore, taut muscles

WHAT IS CYCLO-MASSAGE®? WHY DOES IT HELP? Cyclo-Massage® with Cycloid Action® is a dynamically balanced

GET THE FACTS-MAIL THE COUPON-NO OBLIGATION



CYCLOTHERAPY, INC., Dept. SC-98 11 E. 68th St., New York 21, N. Y. Please send literature and full information on Cyclo-Massage equipment, (please print) Name Zone State

CYCLOTHERAPY, INCORPORATED, New York, N. Y.

Thorapy M/g. Corp.

NEW EQUIPMENT

For full details on any or all of these products, check the respective listings under "NEW EQUIPMENT" in the master coupon on page 87.



ALL-WEATHER BAND PARKA. Hodgman's smartly styled parka for bands is made of warm, waterproof, extra-strong rubberized fabric doubled to a blanket lining material. Special parka hood with zipper closure can be folded back over shoulders to create cape-like effect in a different color than rest of parka.

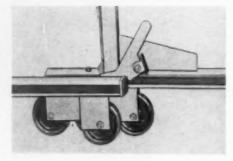


• ELECTRIC MEGAPHONE. Possessing more than a quarter-mile range, Pye's Transhailer features transistor amplifier, 10½" diameter horn, is only 15½" long, and weighs just 5 lbs.



 LOW-COST FLOODLIGHT. Combined with its two bracket arms and three bases, Crouse-Hinds general purpose flood provides a choice of seven different mountings. Lights are available in open or closed type and may be mounted on pipe or on horizontal or vertical surfaces.

e GYM SEAT LOCKING DEVICE. Located at both ends of each tier, this pressed metal gravity latch automatically locks each tier into position as stand is opened. When fully open, bleacher is locked. System (by Hussey Mfg.) is entirely mechanical and replaces less positive friction type locks.





• STADIUM SEAT. Scott Port-a-Fold's Trav-Lure is 10½" x 14½" with 14" x 6" contoured plywood backress upholstered in red, green, or yellow weatherproof plastic. Permits extreme movement, designed for use where aisle space is restricted and for roll-a-way bleachers.



 PADDED WAINSCOT. Built up from heavy cushion of polyurethane (oam fastened to strong plywood back and covered with heavy vinyl-coated fabric, Medart's Safe-Wal prevents dangerous wall-crash accidents. No maintenance is necessary, completely rot- and vermin-proof, low cost.



PROCESSING!



Complete 16 MM Motion Picture Laboratory Services!

FILM - LABS, inc.

604 W. BALTIMORE ST. . BALTIMORE 1, MARYLAND

SPECIAL!

MOTION PICTURE FILM SOLD AT A SPECIAL RATE WITH PROCESSING INCLUDED!

FILM-LABS, inc. 604 W. Baltimore Street - Baltimore I, Md.

Please send me Free Brochure and Mailing Kit for Motion Picture Film.

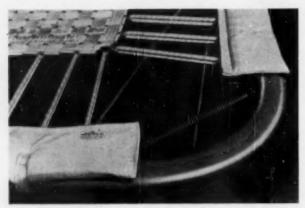
for motion ricing rim.

Name Title
School
Address

Address
City State

NEW EQUIPMENT

For full details on any or all of these products, check the respective listings under "NEW EQUIPMENT" in the master coupon on page 87.



 OVAL-SHAPED TRAMPOLINE TUBING. Now being used on all Nissen tramps, this steel tubing adds strength and rigidity to frame yet lowers weight 33 lbs. Tramp can be folded much more easily, and tubing gives it a neat modern look and allows protective frame pads to lie flat.



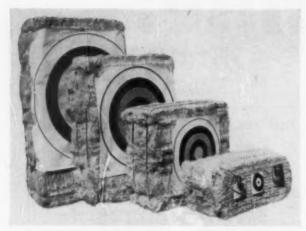
e ANTI-FUNGAL SPRAY. Bike Web's new spray contains exclusive a-Carboxythionisole that steps fungi quickly and penetrates the skin to reach deep infections. Ideal for preventing and treating athlete's foot. Is an active antiperspirant and deodorant.



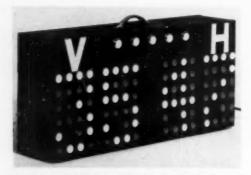
e LEATHER CONDITIONER. Non-sticky, odorless, color-less Snow-Proof waterproofs, snowproofs, reconditions, and softens glaves, balls, shoulder pads, shoes, and other leather goods. Free sample is available.



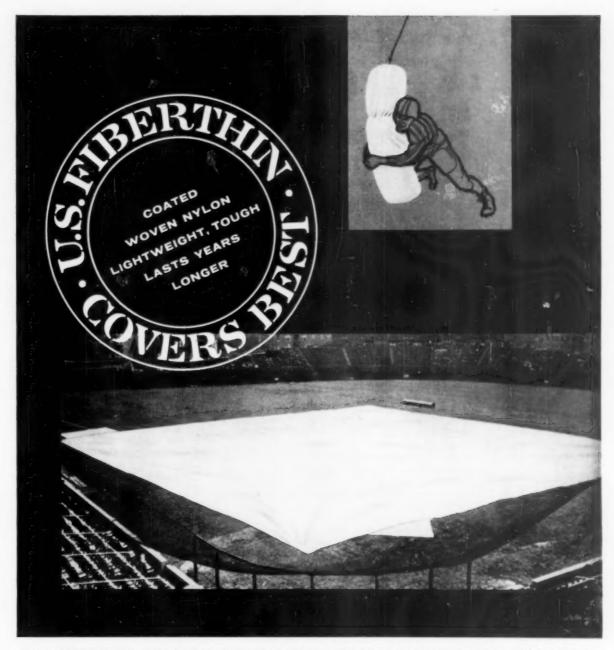
 PORTABLE MEGAPHONE. Transistor-powered Audio Hailer projects speech over half a mile. Unit is selfcontained, operates on standard flashlight cells, and has pistol-grip for one-hand operation.



e TARGET BUTTS. American Excelsior's new butts are made from woodfibre Curlex, compressed and steel strapped. Final firm, long-lasting butt is available in units of 1 to 4 bales suitable for 16", 24", 36", and 48" targets. Provides finely meshed but that catches arrows better, yet is firm enough to prevent arrows from slipping.



• PORTABLE ELECTRIC SCOREBOARD. M. D. Brown's Scoremaster is $24\frac{1}{2}$ " long, $10\frac{1}{2}$ " high, 5" deep, and weighs just 16 lbs. Comes with two sets of numbergrams, new plastic lens, timer with an 8" dial, and buzzer.



U. S. FIBERTHIN TACKLING DUMMY TOUGH YET LIGHTWEIGHT FOR EASY HANDLING

For tackling dummies, athletic field covers, base and gym mats—U.S. Fiberthin is made to take it! Woven of ribbon-like threads of nylon, coated with vinyl or neoprene, this modern covering fabric is remarkably light, yet far superior in tear strength. U.S. Fiberthin will not absorb water...gives extra years of wear...stays pliable and easy to handle in any weather. Fewer men can cover athletic fields in record time—as has been proven in many major league ball parks. Ask your supplier for U.S. Fiberthin, or write for information.



United States Rubber

Mishawaka, Indiana



sky blue, sun tan, mint green, forest green, citrus yellow, and French gray. For complete specification data, write for Catalog 5601. It is yours

Bradley Columns are now furnished in stain-

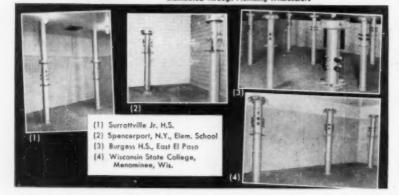
less steel as well as in steel with vitreous or

baked enamel in white and six beautiful colors:

for the asking . . . BRADLEY WASHFOUNTAIN CO., 2281 W. Michigan St., Milwaukee 1, Wisconsin.



BRADLEY) multi-person SHOWERS



Ohio State's 3-Deep Pass Defense

(Continued from page 7)

tions are of the "volleyball" type. By this we mean the ball was hit before being intercepted. With at least six defenders going toward the ball, we have a six-to-one chance of intercepting it.

We've found that a defender who has good footwork, the ability to stay on balance, and who develops agility in movement, becomes a much better defender than the man who depends entirely on speed.

We will change the defense by changing our rush. However, we'll never change the deep defense; we'll always play a three-deep defense. If we rush eight men, we'll sacrifice our intermediate coverage. If we rush three men, we'll sacrifice our rushing in order to get better intermediate and short coverage. But we'll never sacrifice our deep defense.

Against a wide flanker, the halfback on that side will move out. And if that flanker is tremendously fast, our halfback will move back a couple of steps. It's never necessary for that halfback to line up closer to the sideline than 10 yards. He doesn't play the flanker man to man. but instead he drops back and plays the ball in the deep zone on that

In a goal-line defense in which we can give neither the long nor short pass, the defender will use man-to-man coverage.

MECHANICS OF PASS DEFENSE FOR THE DEEP MEN

- 1. Cue on the offensive end and tackle. If both cross the line of scrimmage, it's definitely not a pass. If only the end crosses the line of scrimmage, then you must play it for a pass until you learn differently.
- 2. You should line up with your outside foot back, for your first responsibility is to the outside. The safety man in a diamond defense should line up with his foot back to the open side of the field.
- 3. In practice when you're "playing the ball," you should play it from the same pass angle in which you'll play it in a game so that you won't misjudge the flight of the ball.
- 4. In teaching pass defense, we always use a marked field so the defender will know exactly the amount of territory he must cover.

 We never run backwards. Instead we run sideways. We can improve tremendously on this by constant practice.

Start out by moving under controlled conditions. But increase your speed as the pattern unfolds.

7. Think in terms of interceptions. However, there are two exceptions in which you should play to bat the ball down. The first is on the long pass on fourth down, and the second is in a situation in which the receiver has position on you and you would have to foul him to intercept the ball. However, these are rare occasions.

8. Always intercept high if there are receivers in the immediate area.

THIS article is excerpted from Woody Hayes's wonderfully forthright and meaty contribution to the scientific football-coaching library, "Football at Ohio State." An 11" by 8½" text, it offers a detailed insight into all of Woody's coaching methods. The Buckeye coach covers the entire field in 15 information-soaked chapters, covering each subject clearly and thoroughly. One of the great coaching texts of our time, it sells for \$5 and may be obtained as shown in the advertisement on page 76.

9. As soon as you intercept, take two steps to the inside and then cut to the sidelines for your touchdown run. By stepping to the inside, you freeze the defense and give your blockers a chance to form up. This isn't true on a flat pass; in this case you should take off as fast as possible down the sideline.

10. When you see the ball being intercepted and you're the first man up, immediately look for and block the potential receiver to give the interceptor a chance to get started.

11. Beware of the quarterback who's forced out of his pocket. If he's moving toward the line of scrimmage when he throws, he can throw unusually deep. Don't take for granted that he cannot get the ball away. We call this man a "mad dog" passer, for he may not know exactly what he's doing but what he's doing can be very dangerous to us.

ENDS AND LINEBACKERS DROPPING OFF ON PASS COVERAGE

1. Get back as quickly as you can.

Keep the passer in view as you go back, and be in position to move laterally. When you get back 10 yards, come to a football position.

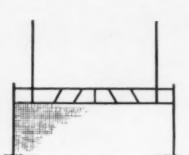
You get total participation in your PHYSICAL EDUCATION PROGRAM with a Gree Harvard Kit for Gold Medal HARVARD TABLE TENNIS TOURNAMENTS



AUSTIN

FIELD EQUIPMENT

Unsurpassed for Quality,
Durability, and Economy





PORTABLE BLEACHERS come in any number of rows of seats desired. Knocks down in a matter of minutes and can be readily transported indoors and re-erected for use in the gym. Built of the finest of materials and completely protected against deterioration by weather.



COMBINATION FOOTBALL-SOCCER GOAL. All-welded galvanized construction. Bridge type truss tubular frame. Practically indestructible. When used as soccer goal, netting is fastened to lower section of goal and two wings are slipped into sockets at either end of goal; heavy spike secures lower end of wing to ground.

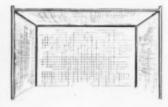




PORTA-WELD UNIFORM RACK.

All - welded construction. Main frame is of 1%" galvanized pipe, bracing of 4" pipe. Rack stands 6' high by 6' in length. Distance between upper and lower bars is 4'. Unit rolls on heavy rubber composition casters.

PÖRTA-WELD MAT RACK. Allwelded galvanized construction. Unit rolls on heavy rubber composition casters. Height 6'2", length 93". (GREEN TOP) Adjustable sliding hooks are above eye level. Rack will take 12' mats.



struction makes this goal extremely rigid.
Tubular frame is heavily galvanized.
Goal fits into galvanized sleeves set in
the ground, making it easily removable.

FIELD HOCKEY GOAL. All-welded con-

LACROSSE GOAL. Is of extra heavy welded construction made to give continuous service for many years with a minimum of maintenance.

Write for catalog of complete line of Austin Field and Gym Equipment or check master coupon on page 87.

AUSTIN FENCE CO., Inc. 701 Bedford Ave., Bellmore, N. Y.

3. We'll set our defenses so that you and the defender beside you can sandwich the good receiver.

RUSHING THE PASSER

1. We must vary the rush between three and eight men. Usually this will amount to heavy rushing on one side and a light rush on the other. So be sure to know your assignment.

Move with movement. Get going as quickly as you can.

Use a head fake as well as a fake with your feet to draw the blocker out of position.

4. To get rid of the blocker, you must control his head. In making contact with him use the "same foot, same arm." This will give you extra leverage.

5. We always use a "contain" rush; that is, we keep the receiver from being able to roll outside of our rush.

6. Get depth fast.

7. Bring your hands up just as the passer cocks the ball. If you bring them up too early, you'll hurt your rushing. If you bring them up too late, you've given up your best weapon; for if the passer has to throw over your hands, his efficiency is radically reduced.

8. Tackle the passer from the top

down

Peel off to the side to which the ball is thrown and get ready for your block on the interception.

Bradley's Slot

(Continued from page 40)

pulls, screening the defensive tackle, and picks up the first man to the inside; the center blocks the man over him; and the left tackle and guard proceed downfield, peeling back to block pursuit men.

After running the toss play with great success, we may find the defensive tackle beating the guard's screen and becoming very aggressive. We find that by influencing him with a pulling tackle, we're able to trap back inside of him, as Diag. 6 illustrates.

The quarterback reverse pivots, fakes a toss to the halfback, and gives to the fullback, who runs inside the offensive tackle. The halfback bellies back as though running our toss play, while the fullback takes a lead step to his right and blows inside the offensive tackle after taking the handoff.

The blocking is as follows: The right end proceeds downfield to block the safety man; the right tackle pulls to influence the defensive tackle; the right guard blocks the man over him as does the center; and the left guard pulls, trapping the defensive left tackle.

Diag. 7: The quarterback spins, fakes a handoff to the fullback going off guard, and gives to the halfback. The fullback blows into the hole left by the guard, who has pulled, and blocks the linebacker. The halfback blows straight ahead to the off-tackle hole.

The blocking is as follows: The left end goes downfield and blocks the defensive right back; the slot man fakes at the defensive end as though to take him in and then blocks out the on-side linebacker; the left tackle blocks man for man; the left guard pulls and blocks the defensive end; the center blocks the man over him; the right guard goes downfield and blocks the deep safety man; and the right tackle goes downfield shallow and blocks pursuit men.

These are just a few of the plays that we run from the slot formation. All of them may be used on the other side when the flanker sets on that side.

"Here Below"

(Continued from page 5)

ing, often overlooked by coaches, is the explosion of the eyes on contact. Too many players close their eyes when establishing contact-causing a loss of direction as well as a loss of time on the follow-up. I firmly believe in an eye-explosion drill in which the player, upon contact, "explodes" his eyes-deliberately widening them.

I'm also one of the few coaches who believe that a good tackler should hit through and down, rather than utilize a lifting action. I feel that all power is derived from the back, and to attain maximum results the back must hit in a straight line through the ballcarrier rather than assume the swayback position essential in lifting.

BILL MEEK (S.M.U.): I believe that some of our conferences are making a serious mistake in prohibiting coaches from recruiting. Where coaches are forbidden to contact the athletes, the recruitment is entrusted to the alumni. And it's the alumni who are responsible for so many of the excesses. Too many of them don't know the rules and are unprincipled. As a result, they plunge their schools into all sorts of boiling water.

The coaches are far better equipped, mentally and morally, to handle the recruitment. If the alumni and other volunteer recruiters would step out of the picture, the problem of recruitment would take a distinctly wholesome turn for the better.

HODGMAN ATHLETIC CLOTHING

Used and endorsed by leading



NO. 140 LITTLE LEAGUER CAPE

Here's real protection for Little League and Junier Footballers. Has all the big league features and same material as our No. 150. NO. 140 WEIGHT. 2½ lbs.

\$12\$E Large beys size only — for 135 lb. weight.

LENGTH. 38" available in other lengths on special order.

NO. 150 DELUXE HOODED CAPE

These worm and windproof capes have been designed to get players in and out of games quickly. They are durably made of worm, waterproof, extra strong yet dyed rubberized fabric doubled to a blanker lining material. All soams are double stitched. Ragina shoulders and full cut allow room for pads and pravide complete pretection for body, knees and seet when player is stiting, kneeting or standing. Gorment is held tagether by fastener at neck and by player keeping hands in specially designed inside packets as shown in illustration.

ISS 1b. weight: A molable in other lengths on special order.

LENGTH: 38" available in other lengths on special order.

LIST PRICE: \$13.35 TEAM PRICE \$9.95

LIST PRICE: \$15.35

TEAM PRICE \$11. TEAM PRICE \$11.50

NO. 159 BAND PARKA

smartly styled perka designed specially or bands. Made like No. 149 with similar A smarrly styled porka designed specially for bands. Mode like No. 149 with similar design features and some warm, waterproof material. Parka hood has sipper closure which permits hood to fold back to give cope like effect, Hood lining is available in a different standard color them rest of parka for unusual color controst. Has snop featener closure and two large parth peckets with flop placed one on each side of front.

NO. 159 WEIGHT: 4 lbs. 2 oz.

51255 EXTRA SMALL — Boys and Misses 12-14 — Length 40"

SMALL — Boys and Misses 16-18 — Length 40"

MEDIUM — Boys 42 — Length 48"

AVAILABLE IN OTHER LENGTHS

ON SPECIAL ORDER

LIST PRICE: \$21.25 BAND PRICE: \$15.95

NO. 149 FAMOUS SIDELINE PARKA

Specially made to meet the requirements of school, college and professional feetball squads. These warm and windproof parks are durably made of extra strong, waterproof vat dyed rubberized fabric double to a blanket lining material. All seams are doubled sittched. Reglan shoulder and full cut to allow ample room for pads. Full skirt so that garmant will go under the seat end over the knees when player is seated. Nickeled, rust proof buckles in front, Extra large sleah packets placed high to make easily accessible when seated on bench.

NO. 149 SIZES: Medium and Lorge. LENGTH: 45 inches. Available in other lengths on special order. WEIGHT: 5 lbs. GHT: 5 lbs. PRICE: \$19.95 TEAM PRICE \$14.95

SEND FOR COMPLETE CATALOG

ODGMAN RUBBER CO. Framingham, Mass

TEACHING and COACHING SOCCER

ERTAIN basic principles must be kept in mind when planning the methods and activities to be used in the teaching of fundamental skills. Stated simply, these would be:

1. For best competitive results, teach the fundamental skills that will be used most often and most effectively in the game.

For best competitive results, teach these skills in terms of the uses made of them.

For best competitive results, practice the skills under conditions to be faced during competition.

A program for the teaching or coaching of any sport must rest on the foundation of skills fundamental to that sport. Only too often we, as teachers and coaches, lose ourselves in a cloud of non-essential skills and meaningless practice. This makes the learning process inefficient and ineffectual.

In the case of soccer, violations of these principles aren't too hard to find both in the literature and in practice. For example, the shin trap, employing a squatting-type action to trap the ball with both legs held closely together, can be found in numerous soccer texts, American and foreign.

This trap is recommended for use despite countless other recommendations about "doing something with the ball," "getting off the mark quickly," and "controlling the body weight meaningfully." The shin trap not only gives the player minimal control of weight and movement but also stops the ball in a hard-to-play position.

Another fundamental often tolerated at various levels of soccer is

that of toe-kicking—despite what is recommended in the literature and through other sources. The chief reason for such toleration is undoubtedly the fact that the beginning player is quite apt to catch his toe on the ground when attempting the instep kick, whereas this isn't a problem in toe-kicking.

To anyone with any soccer experience, it's common knowledge that the instep kick is just as powerful—because of the same muscles being involved—and many times more accurate—because of the much larger surface employed in contacting the ball. Since accuracy is every bit as important as power, this constitutes all the more reason why toe-kicking should definitely be considered taboo on the soccer pitch.

In violation of the principle pertaining to teaching the skills in terms of their use, we have only to turn to the old heading standby, "keep-it-up." This involves a group of players heading the ball in the air as many times as possible before it touches the ground.

Admittedly, this activity is a fine challenge, a lot of fun, and easy for advanced players to use in getting their heads "accustomed" during early practice. However, for teaching new and inexperienced players to head the ball as they'll be required to do most often in competition, it's an extremely poor activity. Whereas in a game, the player will usually be attempting to bring the ball down to the feet of a teammate, this drill has him sending the ball practically straight up.

An example of a fundamental that's infrequently taught in terms

of its full range of uses, is the outside-of-the-foot trap. It's often taught as just another method of gaining control of a rolling or bounding ball. Actually, the outside-of-the-foot trap has many and various uses. For example, it can be used in taking the ball on the turn in the same direction it is traveling, following a fake in the opposite direction with the inside of the foot, etc. Therefore, this fundamental should be taught and practiced in terms of its multiple uses.

The third principle set forth, that of practicing under simulated game conditions, is perhaps the one most often overlooked. Before discussing this principle, however, we must first point out that while this article is directed toward the early instruction in fundamentals for inexperienced players, no attempt is being made to sell short the tremendous value and emphasis that should be given to scrimmaging.

It's quite common to see such drills employed as: (a) "two men out"—with two players moving out dribbling, interpassing, and returning to give the ball to the next two players in line, or (b) "circle trap"—with a feeder standing in the middle of a circle or semi-circle of players and tossing the ball to them for various traps.

These and similar activities are



Each Featherbite Mouthpiece Offers you these Added Benefits

- Total protection against teeth getting chipped, broken or knocked out.
- 2. Non-interference with breathing or speaking.
- 3. Individual fitting around each tooth.
- 4. A \$250 insurance policy free.

IMPORTANT: Featherbite is inexpensive. The average retail price is approximately \$5.00. Group purchases at reduced cost.

According to leading sports authorities, the safest mouth protector ever devised to protect athletes in contact sports is FEATHERBITE.

A properly protected athlete has greater confidence, more aggressiveness. And the ultimate proof will show up in the win calumn where all the statistics are tabulated.

Here are the actual facts on athletic injuries contained in a report by a prominent insurance company: Incidence of dental injuries to athletes (All Sports) Incidence of dental injuries to FEATHERBITE Wearers

In other words, the feeth of an athlete protected by Featherbite are 7200% safer ...

Manufactured by FEATHERLAX Corp.

STATE NATIONAL BLDG. . HOUSTON, TEXAS

To underwrite these statistics and guerantes them, Featherbite issues to each user a \$250 insurance policy without a single cent of extra costin



GET THE REAL FIT! NEW QUALITY PRACTICE PANTS

Designed to the specifications of coaches in every section of the country, this new practice pant has a snug-tight fit with pads moved to the outside thus giving greater protection where hard blocking blows are the most frequent.

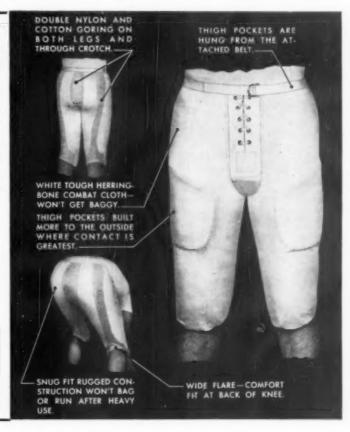
The rugged combat drill cloth is triple the rugged combat drift cloth is triple stitched at the seams and unlike knit parts they will not become baggy nor develop run-ners even after long abusive daily contact. Note all the really desirable points in this fast growing favorite. It is the most reasonable

price quality pant available in the country. Thousands have been sold.

- WIDE FLARE-COMFORT FIT AT BACK OF KNEE
- WHITE TOUGH HERRING-BONE COMBAT CLOTH -WON'T GET BAGGY
- DOUBLE NYLON AND COTTON GORING ON BOTH LEGS AND THROUGH CROTCH
- THIGH POCKETS ARE HUNG FROM THE AT-TACHED BELT
- SNUG FIT RUGGED CONSTRUCTION WON'T BAG OR RUN AFTER HEAVY USE.
- THIGH POCKETS BUILT MORE TO THE OUT-SIDE (WHERE CONTACT IS GREATEST)

You just can't duplicate this quality practice pant at our price. Investigate todayyour dealer can supply you.

OHIO ATHLETIC SPECIALTY CO. 133 BUCKEYE ST. ELYRIA, OHIO





fine if used at the proper time and in proper amounts. After players have been exposed to the various skills and have mastered them to some degree, such activities do little more than serve as warm-ups. Drills that impose some degree of pressure and encompass factors that will be experienced in games should be employed at this stage.

Soccer is a dynamic game with tremendous situational changes but, in general, we can discuss the following as the most commonly used and most effective adaptations of the fundamental skills:

DRIBBLING.

A player should be taught to dribble with the inside and outside portions of both feet so that he may cope with each play situation in terms of player positioning, directional changes, and his own striding sequence. The employment of the outside of the foot should be emphasized sufficiently because of its use in dribbling the ball to the outside, or farthest away, from a challenging opponent.

Various simple drills can be devised that will impose the pressure exerted by opponents in competition. One player can attempt to dribble through two fixed points, the area in between being guarded by a second player. Players can be clocked as to the time it takes them to dribble through an arrangement of players (e.g., a line with each being five or ten yards apart) who are allowed one step in an attempt to tackle the dribbler. The time element increases the necessity for speed.

SPECIAL SITUATIONS

Drills for practicing dribbling for particular situations can also be set up, as in the case of the breakaway. On a signal, a player will start approximately 40 yards away from the goal and dribble as fast as he can toward it. A defensive player will start at the same time at a specified distance behind him and try to catch him for the tackle or to break up the play before the dribbler can close in for a shot. Practice on the break-away situation will quite often pay off in valuable goals scored in games.

KICKING.

Simple drills and scrimmaging can do much for improving ktcking skills, while intensified practice is almost mandatory for short passing and specialized kicking. The latter term applies to such kicks as the pivot instep commonly employed by wings and wing halves in crossing the ball, the slicing type instep

kick employed in shooting, and the chip shot used to drop balls over defenders.

The extent of use of the various kicks is mainly positional in nature, and the alert teacher or coach should have little trouble recognizing these demands.

Drills should be devised to practice situations common to a particular position. Let's take the case of the fullback's need to be able to employ a pivot instep kick in turning the ball upfield.

The fullback is given the ball and an offensive opponent is put on him. The fullback can either be given the ball directly or caused to dribble toward his own goal. He must then turn the ball on the dribble out toward the touch line and employ the pivot instep kick to clear it upfield to a forward.

TRAPPING.

Most trapping is done on the move and in an attempt to keep moving. It's therefore rather inadvisable to emphasize traps in which the player is standing still or in which the ball is brought to a complete stop. In other words, most trapping should be considered as more of a deflecting rather than a stopping action.

In the case of rolling balls, this would mean the use of the inside and outside surfaces of the feet to "do something with the ball" immediately or keep it in a playable position. Neither the shin trap nor the sole-of-the-foot trap lends itself to these purposes very well.

In the case of a bouncing ball or one in the air, various parts of the body can be used to "deflect" it: the inside of the foot, the outside of the foot, the sole of the foot, the thigh, the chest, or the head. In this case, the inside and outside surfaces of the foot are usually used in a smothering type of action at the instant in which the ball bounces. Keeping the concept of constant movement in mind, the player should try to get the ball about three feet in front of him, rather than directly under him, at the conclusion of the trap.

The sole-of-the-foot trap is mentioned because of its use in pushing a waist-high ball in a forward direction with a considerable amount of control. It's not intended for use in the smother-type trap of a bouncing ball.

The simplest drill with which to put a little pressure on the player employs a line of players and a feeder standing at a considerable distance. The first player breaks out from the line on the dead run and, after he has started running, the feeder rolls, bounces, throws, kicks, "Parents Are Big Boosters of High School Riflery"

Writes JOHN KOLKANA Instructor, Everett High School Rifle Club



Remington will help you plan the organization of a rifle club and the building of a range. As a starter, we shall be glad to send you, free, literature on organizing a club and building your range, either indoor or outdoor. Information is also available on opera-

tion of a rifle club, equipment, marksmanship, target shooting and many other subjects of great practical value. Just fill in the coupon below and mail today to the Shooting Promotion Section, Remington Arms Company, Inc., Bridgeport 2, Conn.

	Remington Model 513T "Matchmaster" tool-action target rifle. A high-quality target rifle with all features for match shooting in all po- atitions. Exceptionally fine ac- euracy, (Right) Remington 22
Remington,	ammunition with exclusive "Kleanbore" non-corrosive priming.
QU POND	Shooting Promotion Section Remington Arms Company, Inc., Bridgeport 2, Com. Flease send me, free, literature on organizing a club, building a range operating a club.
"If It's Remington—It's Right!"	Address
"Metchmaster" and "Kleanbare" are Reg. U. S. Pat. Off. by Remington Arms Company, Inc., Bridgeport 2, Conn.	City & State

For that Extra Ounce of Endurance!



It's a scientifically accepted fact: an athlete's endurance-his energy to last-depends to a large extent on the efficiency with which his body utilizes carbohydrates-the energy foods. And strong evidence indicates that wheat derivatives - when consumed regularly-contribute greatly to this

Try adding Kretchmer's Wheat Germ to your training regimen - and check the results! Kretchmer's Wheat Germ is available through grocery stores - everywhere.

Supplies the Following Percentages of Recommended Daily Dietary Allowances

NUTRIENT				
og	e-10	16	25	45
Thiamine	38.0%	25.0%	30.0%	33.0%
Riboflavin	10.0%	7.5%	11.0%	11.0%
Niacin	9.5%	6.5%	7.5%	8.0%
Vitamin C	4.8%	3.6%	4.8%	4.8%
Vitamin B.	16.0%	16.0%	16.0%	18.0%
Protein	13.5%	9.5%	14.5%	14.5%
Iron	20.0%	16.0%	20.0%	20.0%
Phosphorus	19.0%	16.0%	28.0%	26.0%

Vitamin E. Wheat germ is the richest NATURAL source of Vitamin E.

Sodium. Wheat germ is low in sodium. For this reason, it is recommended as a source of good quality protein for persons on sodium-restricted diets.

NOTE: These Percentage Values are Slightly Higher for



KRETCHMER wheat germ

Write for "Suggested Ways of Freding Wheat Germ to Athleres in Training."

**RETECHINES WHEAT CREM CORPORATION CARDOLITON 1, MICHIGAN

Name of independent testing laboratory, supplied on reg

"Don't Tape Your Time Away" - Order Today C. D. DENISON - DUKE WYRE SHOULDER VEST



Specify Rights-Lefts Small, Chest Size 32"-39" Medium, Chest Size 38"-45" Large, Chest Size 44"-51"

Protection For:

Knock Down Shoulders, **Dislocations and Separations**

> IMMEDIATE DELIVERY PRICE \$26.50 EACH

C. D. DENISON Orthopaedic Appliance Corp. 220 West 28th St., Baltimore 11, Md.

Phone BElmont 5-9645

or punts the ball at any height, speed, or direction he wishes. In this way, the trapping player is forced to make the trap "on the move," as will be the case most often in the game.

To make the situation even more difficult, two lines can be formed at least 10 yards apart. The first player in each line starts out, the ball is again brought into play from any angle, and the boys fight it out for the trap and for possession.

HEADING.

This skill is of tremendous importance in obtaining and maintaining possession of the ball because of the numerous times it is kicked above the head during a game. While different styles can be used, the situational demands and the desired end results are very much the same.* Heading can be used in trapping, in passing, in clearing, and in shooting. Drills can be devised for the situations which arise in each.

HEADING UNDER PRESSURE

To practice heading under some pressure, the same set-up as the trapping drill can be employed. A line is formed with a feeder some distance from it. The first player runs out and the ball is put into the air for him to head back to the feeder, head to a third player, or trap by use of his head. The drill can also be run in front of the goal for practice in heading as a scoring attempt.

Again, the drill may be changed to incorporate two lines and two players fighting it out for the head ball. The latter drill is extremely good for teaching the value of positioning in this situation. In both of these drills, the speed, height, and direction of the feed should be changed from time to time.

The preceding drills are merely a few of the many competitive or game-situation types that can be devised. They're definitely not presented as the only drills or the ideal drills for every teaching and coaching situation. They merely illustrate what can be done to improve practice of the fundamental skills along the lines set forth at the beginning of this article.

The use of imagination and creativeness in analyzing the total teaching situation and then planning the various practice sessions will certainly increase the rate of learning and the enjoyment derived through competition in soccer.

^{*}Howard G. Knuttgen, "Use Your Head," Scholastic Coach, Vol. 26, No. 3 (November 1956), p. 22.

How About 8-mm. Film for Your Game Movies

(Continued from page 36)

The processing laboratory bisects the film down the middle and returns it as single-run 8-mm. film. This is double the length shown on the carton. A 100-foot roll of unexposed film becomes 200 feet of processed 8-mm. movies.

It should also be remembered that there are twice as many frames of 8-mm. to a foot of film as compared to 16-mm. For example, a play that takes ten feet of 16-mm. film requires only five feet on 8-mm. Thus, 200 feet of double-run 8-mm. film will show the same thing as 800 feet of 16-mm. moving pictures.

Equipment costs for 8-mm. is about half that of 16-mm. Some examples:

Bolex H-8 with 1½ inch telephoto lens\$240 Bolex H-16 with 3-inch telephoto lens \$574

(Bolex camera is mentioned because it's the only 8-mm. camera that can take the 100-foot reel of 8-mm. double-run film. Other cameras on the market take 25 feet of film. A complete quarter in football or basketball can be filmed on half the width of 100 feet of film. Motor for continuous filming costs \$95.)

8-mm. analytical projectors

16-mm. analytical projector.\$390. Since the end of World War II, great strides have been made in movie-making equipment, especially in the 8-mm. size. High schools can take advantage of this; the savings in the cost of film and equipment is well-worth thinking about.

Don't cut your film budget, but switch to 8-mm. and give the other coaches in your school the same advantages and help you enjoy with analytical athletic movies.

TRACK QUESTIONS WANTED!

FRED WILT, former national distance running champion who's one of the world's greatest authorities on his specialty, is currently engaged in writing a tremendous book on running and training for the 880, mile and two-mile events. The book will feature a special question-and-answer section on every possible phase of training and running. Any athlete desiring to fill out a questionnaire on his training for possible inclusion in the book may write to Fred for one. Questions by coaches are also being solicited. Write to Fred Wilt at 2540 Edgelea Drive, Lafayette, Ind.

WHAT MAKES A HAPPY COACH?



A winning team, of course!

And what makes a winning team? Many important things, including team morale.

We've been told by coaches everywhere how important clean, fresh practice uniforms are to health and morale. Jersies, pants, socks, T-shirts, towels and supporters can be issued clean every day with UniMac laundry equipment.

UniMac's wash-action is thorough and fast. Sweat and dirt are immediately removed from washables. They last much longer. You can operate with less inventory.

UniMac's thorough rinse-extraction insures faster drying. Today's uniforms can be washed today, ready for practice tomorrow. You save on commercial laundry service—no delays, no counting, no checking, no losses!

All this without hiring special help! UniMac is easy to operate. At

most schools student managers do the team's laundry in only a few hours.

The UniMac Twin washer-rinseextractor combination is rugged commercial equipment. It processes 120 lbs. per hour in only 10 sq. ft. of floor space. Comes fully equipped with heavy duty electrical and plumbing connections. Easy and inexpensive to install, maintain and operate.

UniMac Pays for Itself Out of Savings!



You Can Still Have Your UniMac In Time for the Big Fall Season!

IT'S NOT TOO LATE!

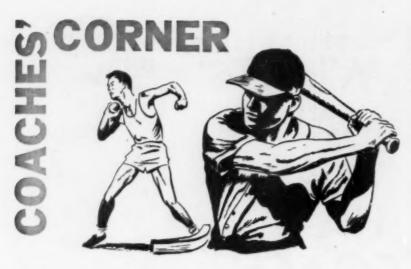
GET ALL THE FACTS UniMac

WRITE TODAY, Dept. K-98

COMPANY

723 Ponce de Leon Place, N.E.

Atlanta 6, Georgia



Please send all contributions to this column Scholastic Coach, Coaches' Corner Dept., 33 West 42 St., New York 36, N. Y.

WELL-KNOWN football coach vis-ited a psycho ward to talk football with the patients just a few hours after his team blew a 14-point lead in the last quarter. In the middle of his talk, one of the patients broke in with: "Ah, you're a bum. All you do is blow leads."

The ward doctor apologized to the coach. "It's very embarrassing," he said. "But you know: It's the first sensible thing he's said in months."

One afternoon Lefty Gomez's fiancee, the beauteous June O'Dea, dropped in at the Stadium to see him pitch for the first time. Lefty pitched his heart out, but lost a 14-inning thriller, 1-0.

In an effort to console her spouseto-be after the game, the musical comedy star murmured, "Never mind, honey. You'll beat 'em tomorrow.'

"Tomorrow!" screamed Gomez. "You must have me confused with Iron-Man McGinnity!"

George Raft helped Maxie Rosen-bloom up the ladder to the lightheavyweight crown, and when the Friars Club threw Raft a testimonial dinner to celebrate Raft's 25th year in pictures, Maxie was on hand as one of the speakers.

"Gents," roared the irrepressible Maxie to the biggest names in movie making, "I owe a lot to George Raft. When I first met da bum, I didn't have two bits to my name. Now I owe \$25,000. Tanks, Georgie.'

When Lefty Gomes was fast-balling them for the Yankees, the coaching staff's big worry was that the unpredictable Senor wasn't concentrating enough. One afternoon, the White Sox loaded the bases against him and Coach Art Fletcher immediately walked out to the mound. He wanted to make sure that Gomez was aware of the situation.

"Say, Lefty," he said, "do you know the bases are loaded?"

Gomez looked at him grimly. "Of course I do," he snapped. "I know I'm not playing with two infields in back of me!

Try as he might, Paul Richards couldn't get the rookie infielder to play the ball rather than let it play him. After the rookie cost the Orioles a ball game, Richards lost his pa-tience. "From now on," he snapped, "it's going to cost you \$25 every time you fail to charge a grounder.

That very noon, the young infielder lost the game by playing a hopper on its second rather than first bounce. When the kid returned to the dugout, Richards told him, "That play cost you \$50."

"But you said you were going to fine me only \$25," the rookie protested.

"That was this morning," gritted Richards. "I've since decided to make it \$25 a bounce.'

In a late spring exhibition game, the Dodgers belted Lew Burdette pretty badly in the first inning and Coach Billy Herman was sent out to the

"It's only an exhibition game," Lew protested. "Let me stay in. I need the work."

"Sure you do," grinned Herman. "But the outfielders are getting more than they can use."

While managing Minneapolis one year, Tommy Heath became incensed when his slumping hitters began paying too much attention to golf. The Millers' skipper called a club meeting and announced:

"Certainly you can keep playing golf, but from now on the green fees will be 50 bucks."

Milwaukee Manager Fred Haney is still twitted about his dark years with the hopeless Pirates. "Oh, it wasn't so bad," Haney grins. "I once remember when we lost eight in a row. The ninth day it rained and I tossed a victory party for the play-

On the day Haney received a national safety award, outfielder Jerry Lynch, in quick succession, dropped a fly ball, got hit on the head with another fly, fumbled a grounder, hit the left field wall with a throw, then tripped himself and fell flat going back for an easy fly.

At this point, Haney took him out of the game. "I had to do it, Jerry," he explained. "If I didn't, you'd have gotten killed and they'd have taken away my national safety award."

Kansas City scout Bubber Jonnard received a letter from an aspiring young pitcher who asked for a chance to prove himself. "I have a fast ball like an intercontinental missile, a curve that arcs like a satellite, an inshoot that looks like a profile of Jayne Mansfield, and a drop that dives like the Nautilus.'

"Did you bring him in for a look?"

Jonnard was asked.

"I sure did," grinned Bubber.
"Then I traded him to the Defense Dept. for two space cadets.'

After graduating from Harvard, Charlie Devens reported to the Yankees carrying a suitcase plastered with travel stickers from all over the world. The great Lefty Gomez studied all the stickers carefully, then turned to Devens and said:

"Y'ever been to Newark, kid?"

Once a Harvard man always a Harvard man. That even applies to Howell Stevens, an old Harvardian who now covers sports for a Boston paper. He was once asked if he could contribute anything to the obituary of a Harvard alumnus who had been president of several corporations, a leading philanthropist, a pillar of society, and a noted authority on the history of naval warfare.
"Oh, him," replied Stevens, "he's

the bum who got caught stealing

home in the Yale game."

Mrs. Carl Furillo was trying to prove helpful at the dinner table by ladling heaps of carrots onto her famous hubby's plate. "Carrots are good for your eyes, dear," she explained.

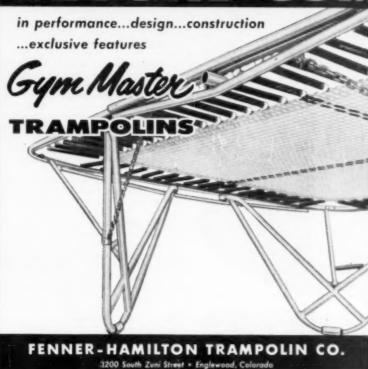
"Yes, honey," the Dodger outfielder sweetly replied. "But they'll never straighten out the curve ball."

Speaking of curves, there's the one about Joe Kelly, old-time Reading outfielder who was sold to Toronto because he couldn't hit that kind of pitch. On his way to join his new club, Kelly was stopped at the border by the immigration officials. "How long do you expect to stay in Can-ada?" asked one of the officials.

"Until they start throwing curves," promptly answered Joe.

When Tommy Byrne started out in organized baseball, he was so wild he couldn't keep the ball in the park.

BEYOND COMPARE...



Mede Better Where It Counts Most . . . with sixteen direct points of support to the perimeter frame . . . MORE supports than any other trampolin! Exclusive separate 4-leg construction with extra direct supports to each corner—performance-proved the best method of trampolin construction!

Exclusive Super-Safe All Clear Understructure—no understructure beneath the performing surface . . . guarantees absolute safety and more tricks with greater ease!

Fost Fold Action—one man can fold the legs and perimeter frame in seconds thanks to Gym Master's exclusive fool-proof non-projecting streamlined hinges and pressure-lub leg bearings! The folded Gym Master, mounted on its own roller stand, rolls easily through any standard doorway!

Super-Enduro Nylon Web Bed—woven on the exclusive Gym Master precision engineered Trampolin-Bed Looms and Tension-Stitched with four rows of ultra strong Nylon thread.

Mono-Strip Cuble Anchors—climinates anchor fly-off completely with three times as many hook-up points. More strength—better bounce action!

Gym Master Trompolins are BEST
—feature for feature! WRITE TODAY
FOR OUR NEW 1958 CATALOG.

THESE TWO REALLY WORK!

Designed especially for football players

IF A BRACE WILL HELP— THIS ONE DOES IT!



HEAVY-DUTY KNEE BRACE SMALL—MED.—LARGE—EX. LARGE

Both of these braces are inflatable to any desired pressure and are completely adjustable.

These same braces have been used for years by leading coaches and trainers throughout the country.

The ANKLE BRACE can be used in place of taping. Wonderful "off the field" support.

The KNEE BRACE gives support where you want it and as much pressure as is desired.

No hinges, ball bearings or other metal gadgets. Fits either leg.

Thousands in use now. Order direct or write for catalog.

AIR PAD and BRACE Co.

133 Buckeye Street Elyria, Ohio



ADJUSTABLE ANKLE BRACE

For these shoe sizes:

7 to 9-small

9 to 11-medium

11 to 14-large

Very effective when worn to hasten recovery from sprain or injury.





Master Lock Company, Milwaukee 45, Wis. World's Largest Padlock Manufacturers

One afternoon the general manager called him into his office.

"Tommy," he said, "I'm sorry but I'm sending you to Hutchinson."
"For whom?" asked Byrne.
"For nobody," the g.m. informed

him. "It's an even trade that will strengthen our ball club."

In the early days of night ball, Elmer Singleton, former big leaguer, was once batting in Albany, N. Y., with a 2-and-1 count. As the pitcher wound up, the lights suddenly went out. Singleton, frightened, immediately hit the dirt. After hugging the ground for about a minute, he began feeling foolish and started getting up. Just as he did, the lights suddenly came on again.

Quite a sight greeted his eyes: Every infielder and outfielder, even the catcher, was flat on the ground!

On a blooper to left, burly Johnny Blatnik, then playing for Houston, tried to score from second. Behind the plate was Tiger Tappe, the Beaumont funny man. The small but tough Tiger held his ground. Just as he caught the ball, he was sent crashing against the front-row box seats. He lay there, a quivering lump of protoplasm as the ump came rushing up to him.

"Tappe," bellowed the ump, "if you've got that ball, that guy is out!" 'Got the ball?" moaned the catcher. "Mr. Umpire, I ain't even got my

shinguards!"

Did any high school ever have a sports year as "big" as the one Pompano Beach (Fla.) H. S. enjoyed last year? Good old P. B. H. S., a member of the Suncoast Conference, copped eight out of 10 possible conference crowns!

It picked up all the marbles in basketball, baseball, girls golf, boys golf, boys tennis, boys swimming, and girls swimming; and was cochamp in football. It finished out of the winner's circle only in track and girls tennis. That's one school that isn't sobbing, "Wait 'til next year."

Can you name the oldest high school football rivalry in the land? Alas, nobody keeps track of such records. But we're ready to believe the claims of a couple of Baltimore high schools-Baltimore City College and Baltimore Polytech Institute. On Turkey Day, they'll rap helmets for the 70th time!

It all began way back in 1888, and the classic has continued with only one break-in 1902. That's an awful lot of punts under the bridge. In fact only a handful of college classics have more whiskers on 'em. The City-Tech game is older, for example, than such famous rivalries as the Army-Navy, Ohio State-Michigan, and California-Stanford games, In Baltimore it has become more

than a game. It's now a public fiesta, run by the student governments. It climaxes a week of pep rallies, mass demonstrations, and banquets at both schools. And it always draws a crowd



of 20,000.

The log for the 69 games so far reads: City 35 wins, Poly 27, with 7 ties. But poor City has gone hungry since 1949—the Engineers having won seven in a row.

Deep in the heart of Texas, all eyes this year are on Royse City High and its great ball-carrier, Danny (Dart) Davison. Thanks to the Dart's great ball-carrying, the Bulldogs are entering the current season on top of a 30-game winning wave. What's more, they've copped seven district and four regional crowns in a row.

Danny has made the all-district team for three straight years. He has started 35 games in a row and has scored in 22 straight. In leading the Bulldogs to a smashing 13-0 record last year, he carried the ball 195 times for 1,630 yards—an average gain of 8.3 yards per carry.

But football isn't the only sport in which the Dart shines. He also twinkles in track and basketball. In the district track meet last spring, he copped five first places—winning the two dashes, the low hurdles, discus, and broad jump.

Does he find any time to study? And how! He boasts an "A" average

in every subject!

Training a 4:13.2 Schoolboy Miler

(Continued from page 34)

he ran a 4:16 and a 1:56.6.

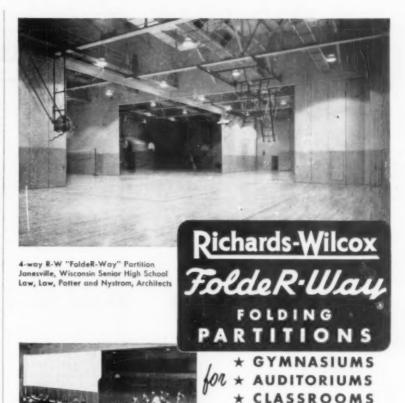
On May 31 in the state track meet, he came up with a pulled groin muscle, but still managed to win the mile and the 880 in state record timings—4:21.8 for the mile and 1:56.9 for the half.

Then came the National AAU meet at Bakersfield on June 20. Imagine a mere high school stripling being put in a heat with such world-ranking milers as Elliott, Grella, Walters, Wheeler, and Villareal. Nervous and scared, Burley ran a 4:11 to finish eighth in the heat. The winning time was a sensational 4:01.3.

A 4:11.4—fastest ever run by a schoolboy—is hardly anything to sneeze at. But the Cottage Grove youngster said afterward that if he could run the race again, knowing as much before as he did after, he would have done better—and I believe him.

Where does he go from here? You can't really tell. But it can only be onward and upward. And onward from a schoolboy best of 4:13.2 and 4:11.4 must end somewhere around 4:00—if not better!

I sincerely expect him to break the four-minute barrier during his career.



R-W Aluminum "FoldeR-Way" Partition West Senior High School, Aurora, Illinois Childs and Smith, Chicago, Architects



Deluxe veneered R-W Partition with chalkboard University of Pittsburgh, Pittsburgh, Penn. Schmidt, Garden & Ericksen, Chicago, Architects



R-W "FoldeR-Way" classroom divider Grace McWayne School, Batavia, Illinois Raymond A. Orput, Rockford, Architect

R-W Folding Partitions effectively and economically solve the problem of dividing space and allow you to efficiently utilize every available foot of valuable floor space, Ideal for dividing gymnasiums, auditoriums and classrooms to meet the changing needs of various sized groups. R-W sound insulated Folding Partitions can be furnished in all types and combingtions of wood, vinyl, metal or duck covering to meet your decorating plan. Available in a type and size to meet almost any conceivable situation . . . manually or electrically operated.

Contact your local R-W Sales-Engineer...he will survey your problem and recommend the right type and size "FoldeR-Way" Partition to do the job . . . there's no obligation involved for this R-W service.

SEE OUR CATALOGS IN SWEETS
PARTITIONS 224 WARDROBES 234

NOTE...R-W also manufactures a complete line of top-quality Wardrobes for schools, churches and institutions. Write today for complete information.



606 W. THIRD STREET, AURORA, ILL. . Branches in Principal Cities

 OFFENSIVE FOOTBALL, THE "BELLY SERIES." By Jordan Olivar. Pp. 99. Illustrated. New York: The Ronald Press Co. \$2.95.

ONE of football coaching's most successful practitioners, Jordan Olivar has compiled an enviable record as a technician and an organizer, which he keeps intact in this maiden literary effort.

His book offers a keen and thorough insight into the mechanics of the popular belly series. The Yale head coach first explains the philosophy of the belly in isolating and pressuring the key defensive man, then delves into the personnel and the skills required of them.

Next comes the numbering system and the blocking patterns and funda-



New Books on the Sport Shelf

mentals. Then Olivar is ready to detail the actual mechanics of both the inside and outside belly, explaining the assignments of every player.

Other valuable chapters include passing from the belly fake, quarterback training and play calling (including a manual of do's and don'ts and a game plan), specific values of movies, and integration with other series

Coaches on every level of play ought to "eat" this one up.

 SCOUTING TO WIN IN FOOTBALL. By Paul C. Campbell. Pp. 120. Illustrated. Silver City, N.M.: College Graphic Arts Press. \$3.

A FORMER coach now a professional scout and school superintendent, Lefty Campbell offers a detailed and well-organized manual of scouting materials that explains exactly what to look for and how to record every essential facet of the game.

Predicated on vast professional scouting experience, the material is concrete-sound and thorough, and should prove invaluable for coaches, scouts, and players alike.

A hardy looseleaf book of Charts to use along with the scouting manual is available for \$1.

 SIMPLIFIED MULTIPLE DEFENSE. By George A. Katchmer. Illustrated. Englewood Cliffs, N. J.: Prentice-Hall, Inc. \$4.95.

IN keeping with the trend toward variation and multiplicity, the great majority of coaches are leaning more and more toward multiple defensive patterns. In fact, the multiple defense has become even more popular than the multiple offense.

In this book, the astute coach of Millersville (Pa.) State Teachers College presents an unusually practical method of developing a multiple defense. Predicated on sound teaching methods, the book shows you exactly how to build your defensive bastions.

The author covers the subject in 14 big chapters, namely:

Why Multiple Defense, Combating the Modern Offenses, Defensing the Passing Game, the Four-Man Defensive Line, the 5-3-2-1 Defense, the Stunting Five-Man Defenses, the 5-4-2 Defenses, Six-Man Defenses Against Running Games, Seven-Man Defenses: The Basis of Multiple Defense, the Eight-Man Defense, Goal-Line Defense, Defensing the Spread Formations, Multiple Defensing the Kicking Game, Summary of Modern Defensive Theories, How to Scout for Multiple Defense, and Multiple Defense in Action.

Each chapter is covered in fine detail, and the overall effect is quite overpowering. It's guaranteed to put every coach on the defensive.

 FUNDAMENTAL FOOTBALL. By James Holgate. Pp. 100. Illustrated. New York: The Ronald Press Co. \$2.95.

WITH most football texts being devoted to specific systems, this book is exceedingly welcome in that it offers a guide to all the basic fundamentals.

amazing Sico...

TUCK-AWAY TABLE



Now, convert any space to a recreation room and back again in seconds.

Now, even though you have limited space, you can provide table tennis for your students. The Sico Tuck-Away rolls, unfolds and folds so quickly and easily. Can even be handled by a child. (Will not tip in folded or unfolded position.) This means that any room (gymnasium, hallway, ordinary room) can become a game room.

The table is regulation size, yet stores in a 16½ x 60" area. Net stays in position. Rugged construction guaranteed 10 years. Can be used as a conference or banquet table too.

FREE

illustrated folder describes all the outstanding features of this amazing table. Write today for your copy.



Manufacturing Company, Inc. 5215 Eden Avenue South Minneapolis 24, Minn. • Dept. 809 It's the type of volume that can supplement every coach's teaching plan, no matter what kind of system he is using.

The Yale freshman coach, a solid fundamentalist, graphically describes all the fundamentals indigenous to the game. With the aid of many fine sequence photos, he details the mechanics of offensive line fundamentals, defensive line fundamentals, and center fundamentals.

He then turns to backfield techniques, explaining the mechanics of backfield fundamentals, punting, passing, quarterback skills, and pass receiving.

A real solid piece of technical writing, this book should prove a fine reference source for both school and college coaches.

 COACHING HIGH SCHOOL TRACK AND FIELD. By Brother G. Luke. Pp. 228. Illustrated. Englewood Cliffs, N. J.: Prentice-Hall, Inc. \$6.50.

THIS big, handsome text, written by the hugely successful West Philadelphia Catholic H. S. coach, is a high school man's dream.

It covers all the events magnificently—from the schoolboy coach's viewpoint! Brother Luke tells you how to select boys for the events, details correct form, offers practice schedules, common faults and how to correct them, etc.

Other splendid chapters cover stimulating interest in the sport, supervising training, coaching tips and aids, etc. This is a fabulous coaching aid.

 SCIENTIFIC BASIS OF ATHLETIC TRAIN-ING. By Laurence E. Morehouse and Philip J. Rasch. Pp. 238. Illustrated. Philadelphia: W. B. Saunders Co. \$4.50.

LET it be said immediately: This is a tremendous book—a splendidly organized, beautifully written, comprehensive tract on the factors which affect maximum performance in athletics.

The authoring team dovetail their talents marvelously. Morehouse, a physical ed professor at UCLA, and Rasch, assistant professor of physical medicine and rehabilitation at the College of Osteopathic Physicians and Surgeons, know their athletes and know their sports. The result is a scientific work of prodigious proportions.

The text is principally concerned with the preparation of the athlete for competition, his protection from injuries; the etiology, examination and first aid care of the injured athlete, and the rehabilitation of the athlete following injury.

The contents are broad enough to apply to all sports. The book covers: Kinesiological Factors (in Athletics), Physiological Factors, Behavioral Factors, Genetic and Endocrine Factors, Age and Sex Factors, Nutrition, (Concluded on page 75)



why are athletic fields for every outdoor sport lined with this superior line marker?

First, for safety. Burns from lime markings can be dangerous, can cause severe skin injuries and serious damage to the eyes. Plus Five cannot burn or injure athletes in any way.

Your playing equipment lasts longer, too — re-conditioning costs are much lower.

Another reason — Plus Five sweetens the soil, actually helps the grass grow greener.

Finally, Plus Five lasts longer. This gleaming marker has staying power, and, over the season, costs less than ordinary markings.

USED ON THE PLAYING FIELDS OF AMERICA—WHEREVER LINE MARKINGS ARE LAID.



CALCIUM PRODUCTS DIVISION

THE GEORGIA MARBLE COMPANY, TATE, GEORGIA



THE GENERAL ATHLETIC PRODUCTS CO., Greenville, Ohio Look to GENERAL for Leadership



In this Model N-525 you get a

lot of board for little money. 26" dial clock; 4" white scoring numerals; red bullseye period indicators; automatic horn. Write for details.

Ask for Free Catalog-15-Basketball; 25-football; 35-Basebell.



INDUSTRIES Webster City, Iowa

Workouts for H. S. Cross-Country

(Continued from page 26)

(c) walk 200 yards.

(d) repeat all steps three more times. No. 28: P.-w.u. 11/2 miles. Run 4 x

880 at racing speed. No. 29: O.—55 min. continuous running. Run 660 near 100 sec.

No. 30: S .- w.u. one mile. Run 18 x 220 in 35 s.

Late Season Training-November-8 Practice Sessions:

No. 31: F .- 35 min. as follows:

(a) jog 200 yards.(b) run 100 yards fast.

(c) repeat both steps for next halfhour.

No. 32: P.-warm-up two miles. Run 11/2 miles at fast pace.

No. 33: O .- jog easily 30 min. Run 880 under 2:20.

No. 34: S .- w.u. one mile. Run 10 x 220 in 30 sec.

No. 35: F .- 35-40 min. accelerating all uphill and downhill grades.

No. 36: P.-w.u. two miles. Run 13/4 miles at racing speed.

No. 37: O .- jog easily 30 min. Run 21/2 laps in three minutes.

No. 38: S .- w.u. one mile. Run 10 x 220 under 30 sec.

It must be emphasized that the above training schedule cannot be applied to any and all cross-country runners. No ironclad rule can be followed in the training of a squad or individual. Each boy is a special physiological and psychological problem and must be handled as such

IMPORTANCE OF CHALLENGE

The above "general training schedule" is an attempt to show the importance of an interesting, challenging, progressive program of crosscountry running. Cross-country is more than dogged training, more than "picking them up and laying them down."

No attempt has been made to elaborate on the fine points of the sport. The dedicated coach must give much thought to form and relaxation, tactics, passing techniques, uphill and downhill running, individual and team strategy.

To conclude, I can do no better than quote Kenneth Doherty, former coach at the University of Pennsylvania:

Running, intelligently guided and gradually increased in distance and intensity over a period of months,

is an invigorating, mentally wholesome, and organically sound activity which will build up a boy. The process of getting in shape is more a mental than physical problem; only that man is in shape who is intelligent about pace and racing tactics, who can keep his mind alert no matter how tired he may feel, and who has a calm certainty that he can and will do his best whether the race is won or lost.

Roll Series from Winged T

(Continued from page 44)

QUARTERBACKING

Our quarterbacks are instructed to run the off-tackle play first. While running it, the QB must learn the opponents' defensive reactions and call succeeding plays in accordance.

If the off-tackle play breaks clean and makes good yardage, he'll continue to run off tackle until it's stopped. If the off-tackle play is stopped because of our inability to effectuate the double-team or trap, then he'll run the sweep. If it's stopped by the linebacker, then we think we're setting up the linebackers for the reverses.

When the QB rolls away after his hand-off, he observes the defensive tackle and end. If they both play his fake, then he'll run the inside reverse. If the tackle doesn't but the end does, he'll then run the regular reverse. If neither plays him, he can be reasonably sure that he'll be able to run the bootleg pass or run.

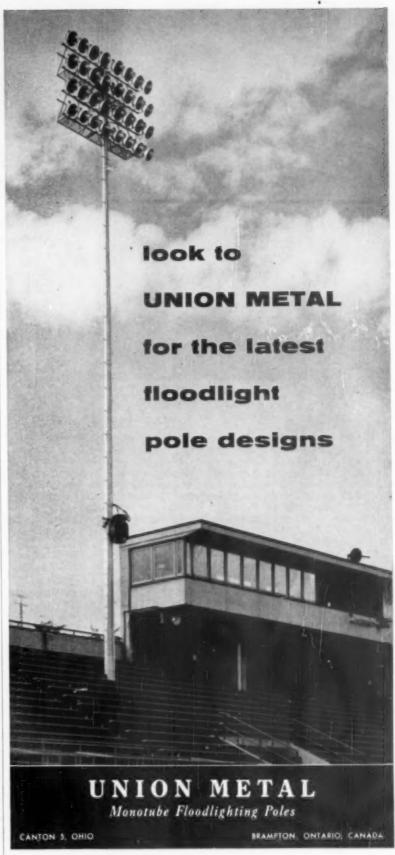
We think it's significant that our backs flow in opposite directions. Besides making good blocking angles for our linemen, this backfield action prevents the defense from executing effective team pursuit. It also creates a problem for teams using a zone pass defense predicated on our backfield flow (to determine their rotation in covering the three deep zones).

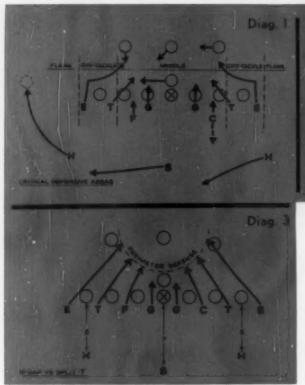
After the Roll Series achieves success and commands the respect of our opponents' defensive planning, we find it advantageous to pass from our short-side wing T. We also run many other T sequences from this variation.

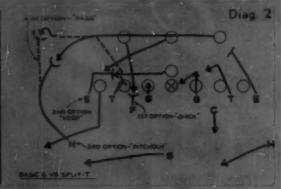
The big coaching fear in running a multiple offense is too many plays. At Englewood, a series of plays must produce impressive statistical evidence to remain in our repertoire. In 1957, the Roll Series was run 60 times for 606 yards and 6 touchdowns!

A closer analysis reveals that Roll 23 was run 17 times for 116 yards and 2 tds; Roll 23w was run 10 times for 126 yards and 1 td; Roll 249 was run 12 times for 152 yards and 2 tds; Roll 246 was run 7 times for 58 yards and 1 td; and Roll 99 outside was run 14 times for 154 yards and 1 td.

These figures firmly established the Roll Series as a permanent part of the Englewood offense.







By BOB SWANSON Catalina High School, Tucson, Ariz.

Basic 6

A systematic defensive plan designed to

PERATING on the premise that every offense is designed to exploit three areas—the sweep, the off-tackle, and the middle—and that the average high school or college offense can be stopped by neutralizing its running game, we have adopted the "six" as the basic rushing formation of our defense.

From our Basic Six, we have five variations with which to throttle the ground thrusts of the T, Split-T, and Single Wing, while providing adequate pass coverage.

We depend upon aggressiveness, ability to tackle, reaction to situation, and simplicity of assignment to make this defense function.

Diag. 1 illustrates the three defensive areas to be exploited and the alignment of the Basic Six to prevent penetration in each.

Protection of the flank is the responsibility of the halfback, who acts as an "outside" end. The offtackle zone is taken care of by the end and tackle, and the middle is covered primarily by the two guards and two linebackers.

It should be noted that our six alignment per se isn't unusual, except possibly for the deployment of the tackles in the gap between tackle and end rather than in the more normal position over or on the outside shoulder of the offensive tackle.

However, our individual assignments may be considered unorthodox and therefore controversial. For example, our ends have no outside responsibility; we regard line-backers as linemen rather than part of the defensive secondary; and even our halfbacks sometimes are visualized as linemen first and as pass defenders second. Our concept of a lineman is one who's on or across the line of scrimmage before the opposing ball-carrier and who has no pass responsibility except of a secondary nature.

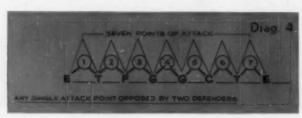
Pursuit, or chasing the ball-car-

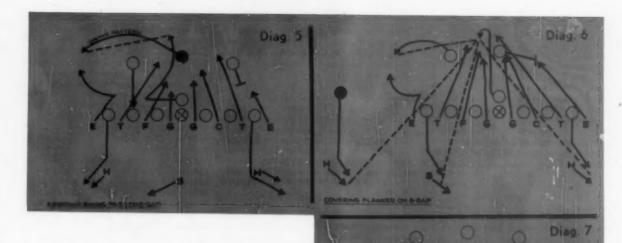
rier on a straight line instead of a curve, is receiving more and more emphasis today. We feel this is important, though we don't want our players pursuit-happy to the extent of non-penetration or giving the runner five yards in order to have the opportunity of chasing

Throughout our entire defensive pattern, we follow two lines of thought. First, each defensive player should be given but one primary assignment. Specifically, an end shouldn't have to protect both inside and outside, or a halfback shouldn't have to decide whether to play for the pass or the run. Many an option-type play capitalizes on the indecision of the defensive halfback.

Secondly, we think of defense in terms of protecting specified areas. We steer away from stunts as well as looping or slanting of linemen. Executed properly by an experienced team, such maneuvers are effective. But any confusion or carelessness in executing an assignment is likely to leave a void in the defense.

On the high school level, we're inclined to think a good offensive gain is more often than not a result of a defensive lapse rather than offensive execution. To confuse offensive blocking, we shift from our





Rushing Defense

ontain the ground game of various offenses

basic six to any one of several variations just before the snap signal.

Following are our ideas of the best defenses against the various types of offenses.

BASIC 6 vs SPLIT-T: We found our Basic 6 (Diag. 2) ideal against the average pure Split-T designed to grind out small yardage while maintaining ball-control.

Since this option-type play employs line splits to spread the defense, our objective then is two-fold: first, to remove the options one by one with specific defensive assignments; and second, to stack the defense to offset the advantage afforded by splitting. We do this by use of our Basic 6, presenting in effect a staggered 8-man line—as both linebackers move in to stop any running play.

Removing the Options:

1st Option, The Dive: On the quick handoff to the dive halfback, we insist our linebacker make the tackle—whether this man has the ball or not. This eliminates the halfback as a possible pass-receiver. The defensive tackle outside and the linebacker inside should be able to sandwich the halfback between them.

On a handoff to the fullback on the slant, our tackle (in the gap inside the end) and our end (having inside responsibility) are in excellent position to stop this threat.

2nd Option, The Keep: Our defensive end is drilled to spring across the line, then move laterally to tackle the quarterback as he attempts to keep, pass, or pitch out. We don't want our end to play a cat-mouse game with the quarterback. The end's aggressive lateral movement down the line effectively nullifies the fullback's attempt to block him out.

3rd Option, The Pitchout: Our defensive halfback on the side of the pitchout has the job of moving up across the line with a rush the splitsecond he sees the ball leave the quarterback's hands, even if a passreceiver is in his sector.

The halfback receiving the pitch has the option of continuing wide on the sweep or passing. Our crashing halfback, then, is in a desirable position to either make the tackle or hurry the pass.

4th Option, Running Pass (from pitchout): Our defensive safety rotating to the side of the pitchout coordinates his action with that of the halfback and automatically assumes pass responsibility to the outside. To continue rotation, our weakside halfback becomes the safety and the weakside linebacker drops straight back to take halfback responsibility.

We recognize the possibility of a reverse developing off the Split-T and therefore tell our end not to chase the play, but rather to penetrate, box and hold position.

Defensive Secondary Play: An obvious reaction to this defense is that it doesn't provide an adequate pass defense. We feel it does. Remember,

it's only on the pitchout that our halfback is poised to move up instantly on the outside.

Should no running play develop, we have normal pass responsibility. Our halfbacks take their respective outside areas and the safety the inside zone. The hook pass is covered by the halfback, whose job isn't necessarily to make the interception but rather to tackle the receiver after the catch. This relieves the linebacker from falling off the line of scrimmage, thus detracting from the line strength.

Should no running play develop, our linebacker drops back five yards to pick up the second man out—generally the halfback on a pass to the flat or on a swing pattern behind the line of scrimmage. The only other pass responsibility given our linebacker is on normal rotation when he becomes a defensive halfback. Since we don't ordinarily have our linebacker "red-dog," or rush the passer, he's the logical choice to thwart the screen pass.

Simply, we depend on three defenders to knock down or intercept the long pass and to tackle the receiver on the short toss. Backfield rotation gives us the equivalent of an overshifted line to take care of each option of the Split-T as it develops,

In other words, our halfbacks take the wide sweeps, thus leaving eight interior defenders responsible for anything run between the defensive ends. This leaves little room for the carrier to maneuver along the line. Summary: Success of the Split-T hinges upon faking on the line of scrimmage to hold the defense in position, thereby setting up options as the defensive man commits himself. To counteract this principle, we don't recognize the possibility of any option; each defender is given one primary assignment to be executed as aggressively as possible, forcing the offense to commit itself prematurely.

Taking heed of penetration in the three critical zones: The flank, threatened on the pitchout, is protected by our defensive halfback; the off-tackle area on the keep or slant is covered by the defensive tackle and end; the middle zone, hit on the quick, sneak, and counter, is the responsibility of the defensive guards and linebackers.

8-GAP vs SPLIT-T: Equally effective against the Split-T is our 8-Gap, a variation of the Basic 6. Here we simply move both linebackers into the line and shuffle the guards in a half man as the offensive center lines up over the ball (Diag. 3).

Aggressiveness and penetration are prominent characteristics of this defense, as all eight defenders shoot through the gap on the snap signal. It may be noted in Diag. 4 that we put a defensive man in the gap on either side of each offensive lineman, thus giving us a numerical advantage of two-on-one at the particular point of attack.

Significance of this is obvious. We concede a block on one man in order to get our second man directly into the opposing backfield.

Success of this defense is dependent upon all eight men reacting aggressively as a unit in a penetrating action. The key men are probably the guards and ends. The former, lined in the gap on either side of offensive center, are in excellent position to break through and pressure the quarterback. The ends penetrate deep at a 45° angle to turn the play in and then go for the quarterback.

With four men concentrating on the quarterback, he has little time to run, pass, or hand off.

Secondary Defense on the 8: Consistent with the Basic 6 and its variations, our secondary is comprised of two halfbacks and a deeper playing safety arranged in tandem fashion, giving us three defenders against the pass. The tremendous rush possibilities inherent in the 8 make for an excellent pass defense. We feel the intended receiver just doesn't have time to go long.

To back up this premise, both halfbacks are stationed only five yards off the line of scrimmage directly over the offensive ends, to break up the short pass.

On analysis pass defense on the 8 is similar to that of the 6. In both defenses, the short hook pass is covered by the halfback. The swing pass normally covered by the linebacker in the 6, is now the responsibility of our end in the 8, as shown in **Diag. 5**.

Often a team will flanker to change

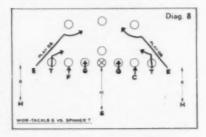
the defensive alignment, but this doesn't disturb our 8-man defensive line in the least. If anything, it becomes more effective, as we have our halfback move out to take the flanker. Our safety then has the strong-side end and our other halfback takes the weak-side end. (See **Diag. 6.**)

The 8-gap isn't a stereotyped goalline defense, although most effective in short yardage situations. It's a suggested game defense vs the Split-T, or whenever the offensive line widens out; also, on first-and-ten in an attempt to put the offense in the hole.

6-KNIFE vs SPLIT-T and SPIN-NER T: This is a good, somewhat unorthodox defense for penetration and disturbing the timing on offensive blocking. Here the defensive tackles move in directly over the offensive tackles, as noted in Diag. 7. Similarly, guards are stationed over guards and ends over ends.

On the snap signal, each defensive lineman knifes to inside of opposite-playing opponent in an aggressive converging action. Linebackers move out to cover the flank, compensating for the closing in of the defensive line, while halfbacks and safety assume their normal assignments as outlined in the basic six. Actually, this defense while aligned as a 6 is a refinement of the 8-gap.

WIDE-TACKLE 6 vs SPINNER T: This defensive variation from the basic six involves the tackles only. These defenders now widen out slightly from their normal gap position to play head over the offensive ends, as seen in Diag. 8.



We feel this accomplishes two things. First, the tackle is in excellent position to hold up the end on a pass. Second, we have greater defensive strength in the vital off-tackle area hit so effectively on the cross-buck and power plays of the T. Recognition of the strengths of the T is necessary in setting up an adequate defense.

First, the T is highly deceptive with the quarterback faking to several backs before handing off, pitching out, or dropping back to pass.

Second, delayed-hitting action permits good use of the cross-buck and power plays.

Third, excellent pass possibilities exist. The quarterback is afforded good pass protection by virtue of a tight line—making it difficult for a defender to slip through—and by faking to backs shooting into the line before dropping back to pass.

Fourth, the relative close-in posi-

tioning of the backs coupled with the tight line provides for power between the ends.

To offset these threats, we abide by a few general principles. A cardinal rule is for each defender to cover his area and not go with the fake. If a defensive man is being hit consistently from an angle, as in a cross-block or power block, we instruct him to first direct his charge at the angle blocker, then quickly drive back to protect his area.

Next, a lineman allowed to come through the line without being blocked should be alert for the trap. After initial penetration, we want him to drop his inside knee and face in.

To minimize the pass, we have our tackles hit the ends on pass situations, which we construe as either 2nd down and 8 yards or more, or 3rd down and 5 yards or more. Awareness of the inside running strength of the T prompts us to assign inside responsibility to the end.

Execution of Wide-Tackle 6:

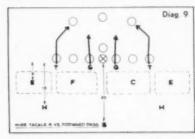
Guards hit and hold position with little penetration, alert for any play over center. Tackles drive hard into offensive ends, then close to the inside. On pass situations noted above, they make a special effort to delay the ends from going downfield.

Ends penetrate 3 yards, hesitate, then pressure the quarterback. Primary responsibility is to the inside. The end opposite the flow of play merely boxes and holds position for the possibility of a reverse.

Linebackers move up into the line on snap of ball particularly alert for the quick handoff to the halfback. Neither linebacker penetrates and is therefore the logical choice to break up the screen and swing passes.

Secondary functions as outlined in the basic six defense, with the halfbacks taking outside responsibility on any pitchout by the quarterback.

WIDE-TACKLE 4 vs FORWARD PASS: This is a specialized defense to stop the passing game. Generally it's used late in the game when the defensive team is ahead and is willing to concede a few extra yards on the ground in lieu of the greater gain-potential of the pass.



As seen in Diag. 9, the only difference in alignment from the Wide-Tackle 6 is now both ends fall off the line to become corner linebackers and pass defenders. Tackles bump the ends hard, as they and the guards rush the passer. The ends and the linebackers

(Continued on page 76)



Proven Complete Face Protection

This is an advanced development of the famous H.N.B. Bar—the outstanding favorite for the past years. The new double bar marks the result of careful study and consultation with the nation's most prominent college and professional coaches. Designed by the best—for the best. It's so simple to attach too—and interchangeable with our H.N.B. Bar. Fits the same holes.

The upper bar raises gradually at the center where protection is needed most, yet nothing has been sacrificed at the expense of visibility.

Wide color selection to choose from—Red, gold, gray or white (natural). Lightweight favorite.

Lowest priced quality double bar on the market.



CLEAT

- FULL COLOR RANGE RED, GOLD, WHITE (NATURAL)
- LOCKED-IN TIP WON'T BURR OR CHIP

new 12,000 seat addition of Safway "De Luxe" steel

bleachers. Corner sections

to be filled in later.

- . WEIGHS ONLY 3.6 GRAMS
- MINIMUM DIAMETER—SHANK
 "DIGS-IN"

TODAY'S MOST ADVANCED FACE BAR

- Adds Greater Confidence
- Fits All Helmets
 Plastic or Leather
- Perfect Visibility and Freedom for Players who Chew Tobacco

SEE YOUR DEALER
OR WRITE DIRECT FOR
COMPLETE INFORMATION



to various units of your squad, or enables you to distinguish at a glance, your game shoes from your practice shoes. Don't fumble for equipment — "Color Identity" will prove a big time saver for you! Look at the features this "sprint king" offers.

Coaches-Before you buy, see the SPEED CLEAT in the new

brilliant color selection that gives quick, easy identification

OHIO ATHLETIC SPECIALTY CO., 133 BUCKEYE AVE., ELYRIA, OHIO

For Your Complete Stadium, Addition or Portable Seating—Safway 'DELUXE' Steel Bleachers



SAFWAY "DELUXE" BLEACHER ADVANTAGES

- ★ LOADS AND SHOCKS DISTRIBUTED evenly by unified, interconnected steel structure (no independent towers).
- ★ SPECTATOR COMFORT AND VISION assured by 8½-in. rise-perrow, 17-in. seat height and 24-in. back-to-back distance.
- ★ EASY ASSEMBLY BY YOUR PERSONNEL. Only 7 types of parts, assembled with simple coupling pins and wing nuts. No tools needed.
- ★ LONG-LIFE CONSTRUCTION. Made from high tensile structural steel tubing with weatherproofed baked enamel inside and out.

FULL SPECTATOR SAFETY AND COMFORT TO 55 ROWS; LIFETIME CONSTRUCTION

DE LUXE SEATING for a wide range of events can be provided economically with Safway "De Luxe" tubular steel bleachers.

This equipment is practical for complete stadia seating many thousands, or for additions to existing facilities (see photo). Made in easily demountable standard parts, it can also be re-used for temporary set-ups of any size and form—outdoors or inside.

Safway provides good vision from every seat, ample leg-room, easy climbing and complete safety.

Investigate Safway "De Luxe" bleachers—submit job details for recommendations (no obligation).

WRITE FOR BULLETIN 39

SAFWAY
STEEL PRODUCTS, INC.
6220 W. Stefe St., Milwaukae 13, Wis.



• Four national record holders, four 1957 repeaters, and a school (North Phoenix H.S.) with three representatives head Scholastic Coach's 8th annual four-deep All-American, arrayed here in alphabetical order.

Criteria for selection were consistency of performance, competition, running conditions, and length of season—rather than a single outstanding effort.

Honor men on the Squad were the fabulous shot putter Dallas Long and high jumper Paul Stuber, both of whom competed on the U.S. International Team the past summer.

State honors, as usual, were won by California with 12 spots (of the 52) to 8 for Texas.

1958

100 YARDS	Beet Mark
Frank Budd (Asbury Park) N. J.	9.7
Sid Garton (New Boston) Tex.	9.5
Jim Puckett (Cove) Ore.	9.41
Alton Thygerson (Pampa) Tex.	9.0
220 YARDS	
Mel Clipper (Muir) Pasadena, Calif. John Fernandez (DuBois) Brooklyn, N. Y.	20.6 20.7
Sid Garton (New Boston) Tex.	20.61
Don Voorheis (Frankenmuth) Mich.	21.0
*** ****	
440 YARDS Mel Clipper (Muir) Pasadena, Calif.	48.1
Bob Cross (Boys Town) Nebr.	48.4
Dave Mills (Lakewood) Ohio	46.6
Bob Raemore (Williamsport) Pc.	48.5
200 VARDE	
880 YARDS Bill Crowley (Compton) Calif.	1:54.0
Jon Dante (Union) N. J.	1:54.7
Rich Menchaca (Lanier) San Antonio, Tex.	1:55.2
David Peltz (Newport News) Va.	1:56.4
ONE MILE	
Dyrol Burleson (Cottage Grove) Ore.	4:13.2
John Cooper (Technical) Fort Worth, Tex.	4:17.9
Tom Laris (George Washington) New York, N. Y.	4:18.9
Archie San Romani Jr. (East) Wichita, Kans.	4:18.9
120 YARDS HIGH HURDLES	
Herb Gaines (Casa Grande) Ariz.	14.0
Floyd James (Centennial) Compton, Calif. Leon Pras (Dover) N. J.	14.1 14.0
Rex Wilson (Snyder) Tex.	14.1
180 YARDS LOW HURDLES	100
Jim Ashmore (Evanston) III. Jim Blair (Highland) Albuquerque, N. M.	18.9 18.9
Sterling Morgan (Snyder) Tex.	18.8
Junior Howard (San Bernardino) Calif.	18.7
HIGH JUMP	
Ray Nickleberry (Oxnard) Calif.	6-8
Paul Stuber (Bellflower) Calif.	6-9
John Thomas (Rindge Tech) Cambridge, Mass.	6-81/4
Hank Wyborney (Port Angeles) Wash.	6-81/4
POLE VAULT	
Henry Aguirre (Belmont) Los Angeles, Calif.	13-101/2
George Davies (North Phoenix) Ariz.	13-101/2
Joe Harris (Baton Rouge) La.	13-91/2
John Rose (Hoover) Glendale, Calif.	14-1
BROAD JUMP	
Willie Davis (Roosevelt) Los Angeles, Calif.	25-5↑
Ted Jackson (Elkhart) Ind. Dan Moore (South Salem) Ore.	24-½ 23-8½
Steve Rogers (Brawley) Calif.	24-6
sero negati (erante), cant	
SHOT PUT	45 101/
Henry Korn (Stepinac) White Plains, N. Y. Dallas Long (North Phoenix) Ariz.	65-10½ 69-3½
Jack Slocombe (Millikan) Long Beach, Calif.	61-41/4
Jim Smith (Poly) Long Beach, Calif.	61-2%
DISCUS	
Jim Brown (McCallum) Austin, Tex.	174-81/2
Karl Johnstone (North Phoenix) Ariz.	178-53/4
Dallas Long (North Phoenix) Ariz.	179-6
Bob Vernon (Oberlin) Kans.	175-111/2
JAVELIN	
Wayne McDonnell (Haddon Heights) N. J.	213-5
Jerry Smith (Junction City) Kans.	217-41/2
Gary Stenlund (David Douglas) Portland, Ore.	215-114
Glen Winningham (Grants Pass) Ore.	215-11
*Betters national record.	

†Performance abetted by wind.

THE 1958 ALL-AMERICAN H. S. TRACK TEAM

ABULOUS Dallas Long, North
Phoenix High shot putter who
represented the U. S. last
month in Russia, leads the 8th annual Scholastic Coach Track and
Field Squad. But he was only one
of the greatest array of prep trackmen ever to cross the red, white
and blue horizon.

National records were bettered this year in the 220, 440, mile, and shot plus the broad jump, but the latter was invalidated because of a following wind. Two events, the mile and the high jump, produced the best group of competitors ever, with boys who ran 4:20.2 being left off the squad. All our four high jumpers cleared 6-8, which would have been a national mark only a few years ago.

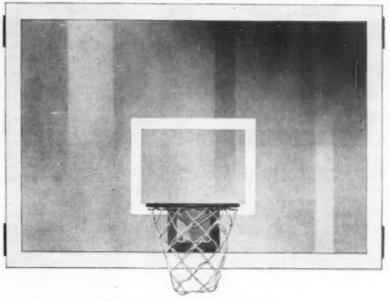
Indicative of the strength of our sprinters is *Mel Clipper* of Pasadena Muir Tech. Though he broke Jesse Owens' 220 mark with a 20.6 timing, he was defeated in the 100 in the California state championships and also sustained a defeat in the 220 during the year. Mel also makes our team as a quarter-miler with a best time of 48.1.

Dave Mills of Lakewood, Ohio, kept alive a Buckeye tradition of great 440 men by shattering-the national mark with a 46.6 clocking, breaking the record set by Willie White two years ago. Mills had a 9.7 100 and a 21.2 furlong and might well have been placed in these events, too.

Dyrol Burleson, the tremendous miler from Cottage Grove, also maintained a tradition for Oregonians. Burley scorched a 4:13.2 mile for a new national record, and in the National AAU championships had a non-winning 4:12.3 in the same heat with Herb Elliott. The Beaver State has consistently produced some of the best milers in the country, although Burleson becomes the first to set a national mark.

Our other milers—Tom Laris of New York City, national indoor record holder; John Cooper of Fort Worth Tech; and Archie San Romani Jr., son of the 1936 Olympian—all bettered 4:19.0

Paul Stuber, a junior from Bellflower, Calif., who was the second high schooler on the U. S. International Team this past summer, heads



Stronger 3 Ways

1. Extra-heavy angle iron frame: provides rigid support that requires no cross bracing.

2. Back plate larger than face plate: distributes shock and strain over larger area. 3. Face plate bolts spaced full 8" apart: preserves full strength of heat-treated glass.

NURRE

All-Glass Banks

Fully approved by the National Basketball Committee for high school, college and professional games. Surprisingly low in cost, easy to install... are not affected by temperature, humidity, or age ... always give true accurate banks ... sure to provide increased seating capacity, a better game for spectators and players alike. And, all Nurre Banks are positively guaranteed against breakage in normal use.

Nurre also supplies all-glass fan-shaped banks and a low-cost rectangular model with 12" wood panel across bottom. Send for free illustrated booklet today.

Order goals from Nurre, too. Specify type of bank, all-alass or with wood panel.





The Nurre Companies, Inc.

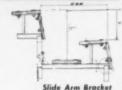
Dept. SC-97, Bloomington, Indiana Makers of Glass Banks Since 1924

EZ-A-WAY

The Best Mechanical Folding
BLEACHER made
WHY ••••

FLOATING ACTION

No steel in contact with steel during opening and closing... does away with springs, tie rods and interdependent parts.



SCISSOR CROSS BRACING

Perfect align.
ment through " m
opening and
closing . . . ussures correct " m
front-to-back spacing.



ORIGINAL "I" BRACING

Original members of "I" beam structural steel . . . utilizing the natural flex of steel in lieu of springs, linkage, other retractable or moving parts.



1st 24 ROW INSTALLATION

The world's largest installation at Vancouver, Washington, shows massive setup



massive setup that safely provides spectators seating.

DELAYED ACTION FORWARD FOLD

Provides maximum floor space for balcony activities.



Write today for complete information, specifications and details of why EZ-A-WAY are the best mechanical folding bleachers made today.



the high jumpers, but not by much. He was tied by another junior, Ray Nickleberry of Oxnard, for the California title at 6-8—a height bettered by John Thomas of Massachusetts and Harry Wyborney of Port Angeles, Wash., during the season. All were consistent at 6-6 and over.

Long, who earned a place in the discus as well as the shot; Karl Johnstone, the top discus thrower of the year; and George Davies, a 13-10 pole vaulter, gave North Phoenix High School four places out of the 52 on the Squad. Thus the school might be considered the national champion.

One other position was earned by an Arizona boy, which put the Grand Canyon State in a tie for third with Oregon in total number of places. California, as usual, led the All-American parade with 12 spots to 8 for Texas—with 18 states in all placing boys.

Toughest event to pick was the broad jump, where the performers were very inconsistent. Willie Davis of Los Angeles Roosevelt had a 25-5 leap (with a wind) which broke the national record, but the other three spots were hard to select.

An unusual feature of the Squad is the appearance of two hurdlers from Snyder, Tex.—Rex Wilson in the highs and Sterling Morgan in the lows.

Sid Carton of New Boston, another Texan, was the only sprinter to place in both the 100 and 220.

Henry Korn of New York's Archbishop Stepinac bettered the old national shot put record with a toss of 65 feet, but was unfortunate to come up at the same time as Dallas Long.

For the second year, all four javelin throwers were over 200 feet, but credit is due the implement more than the throwers. We're still lagging far behind the Europeans in the spear-tossing event.

Long, Wyborney, pole vaulter Joe Harris of Baton Rouge, and low hurdler Junior Howard of San Bernardino, Calif., are the four repeaters from last year's Squad. Three other lads were eligible to repeat but failed to do so for various reasons. Outstanding was sprinter Otis Drayton of Cleveland Cathedral Latin (9.5 and 20.7 last year) who pulled up lame early in the season and was unable to compete in the Ohio championships.

Through the years, California has now accumulated 124 places to Texas's 43. Other leading states are: New Jersey 31, Pennsylvania 25, New York 24, Arizona 22, Kansas 16, and Illinois and Oregon 15.

NAME YOUR BASKETBALL BACKSTOP REQUIREMENTS

. . . AALCO has a Specially Engineered Unit for EVERY Conceivable Building Condition



V-Type Wall Mounting with All-Weather Back board, Tripod bracing provides maximum rigidity possible. There are two other ways to utilize this unique, mounting. Ask your dealer for details

Choice of WALL MOUNTED • SWING-UP PORTABLE FLOOR MODELS

Equipped with the Low-Cost All-Weather Backboard or Official Fan-Shaped or Rectangular Steel, Wood or Glass Banks

And that's not all! Asico Backstops feature an exclusive CENT-R-STRUT method of mounting backboards which puts greatest support directly behind point of greatest shock—where goal fastens on backboard. All Wall Mounted backstops with extensions include the Tripod principle of 3-point support that provides utnost rigidity, flexibility of installation, pleasing appearance.

For Further Information, Consult Your Sporting Goods Dealer, or Write Us.

FREE! Catalog Complete Aalco Line

AALCO MANUFACTURING CO. 2729 Wyandotte St., St. Louis 11, Missouri

NEW AND IMPROVED

RYAN'S H. & R. DRY LINE MARKERS

5 DIFFERENT MODELS

From 20# to 100# Capacity
Olympic Model shown.

Olympic Model shown.

Force Feed — Instant
Shutoff—100 lbs. ca-

pacity.

Shaker in Hopper for Constant Flow.

Adjustable Control on

SAVES TIME AND

Send to Dept. S for booklet on four other models H. & R. MFG. CO., LOS ANGELES 34, CALIF.

SPORTS FILM SERVICE 7 DAYS A WEEK

"All-Sports" Weekend Processing

16 mm. Hi-Speed Reversal (B&W) Processed and returned same Day

Titles made to order
Color & B&W film duplicated from originals

Athletic Special: DuPont 16 mm. Hi-Speed reversal film sold at professional discounts with processing included. Here is a great saving for you.

Arrange today for service. Send for prices.

CINE-O-TONE

6241/2 So. Michigan Ave., Chicago 5, III.

New Books

(Continued from page 65)

Weight Control Programs, Drugs, Strength Training, Massage, Reduction of Health Hazards, Athletic Hygiene and Care of Minor Injuries, Strains and Contusions; Sprains, Dislocations and Fractures, Protection from Impact Forces, and Training Room Design, Equipment and Operations.

Everyone of these chapters is of vital concern to every man connected with a sports program. The information expounded is solid, practical and founded on bedrock scientific principles.

The book belongs on the reference shelf of every athletic office.

. MODERN BASKETBALL. By A. L. Colbeck. Pp. 206. Illustrated. New York: SportShelf.

THE author, who's vice president of the Amateur Basketball Ass'n. of England, takes nothing for granted in this technical treatise. Using an ultra-simple approach, he analyzes the fundamental skills, offers detailed suggestions for introducing the game to beginners, outlines a practical scheme for club coaches, and presents a concise study of team tactics.

The result is interesting but a little strange to the American reader. American distributor of the book is SportShelf, 33 Overlook Terrace, New York 33, N. Y.

Miscellaneous

- 1958 Official NCAA Football Guide and 1958-59 Official NCAA Basketball Guide, \$1 each. (Official rules, records, reviews, schedules, etc., for collegiate games. Order from The National Collegiate Athletic Bureau, Box 757, Grand Central Station, New York 17, New York.)
- Defend Yourself! By Jack Grover. Pp. 80. Illustrated. New York: The Ronald Press Co. \$2.95. (A practical manual of hand-to-hand defensive techniques against almost any type of opponent and any form of attack.)
- · Physical Education for Children. By Elizabeth Halsey and Lorena Porter. Pp. 416. Illustrated. New York: Henry Holt and Co. \$5.75. (A complete, sound program based on the developmental school of thought, with the child's growth and change as the center of attention.)
- · Modern Principles and Methods of High School Physical Education. By Charles C. Cowell and Hilda M. Schwehn. Pp. 327. Illustrated. Boston: Allyn and Bacon, Inc. \$5.75. (Practical analysis of the learning patterns of adolescents and the various methods that will best promote all-round growth.)
- Surf Fishing (2nd Edition). By Vlad Evanoff. Pp. 120. Illustrated. New York: The Ronald Press Co.

"LAMARWAY"

DELUXE UNIFORM DRYING HANGERS

- · Made of strip steel, built to last indefinitely.
- A sanitary method of hanging and drying uniforms.
- Players receive dry equipment daily—a real equipment saver.

GROUND PLUGS . . . for All Types of Athletic Fields

- A simple and accurate method of remarking fields.
- For football-where yard lines intersect side lines, drill holes to exact depth with special ground auger, then drive in plugs-will stay put all year! Send for literature today!

UNIVERSITY ATHLETIC EQUIPMENT CO.

1820 HOPKINS STREET

BERKELEY 7, CALIF.

the choice of the 1956 Olympic team should be yours tool

Champion RACING YLON



Top schools, colleges, clubs and the United States Olympic Committee specify Ocean Champion. Not whim, but a proven record of superiority makes their choice of Ocean Champion almost mandatory.

Stronger tighter weave nylon in Ocean Champion weighs less than two ounces . . . dries in minutes! Double row stitching throughout prevents curling, insures long life.

SPECIFY OCEAN CHAMPION - Number 65. Available in Black, Navy, Royal, Scarlet, Dartmouth Green and Orange. Sizes 22-38. Price \$36.00 per dozen.

60 Whithey-Rebbock Adv. Inc., N. Y. C. ------ 3-FOLD IN HALF HERE

THIS IS

NO POSTAGE OR ENVELOPE NEEDED!

SELF-MAILING

MAIL NOW FOR FREE CATALOG

Follow instructions and mail today for in farmation on Ocean Champion, and complete EREE Catalog of the Ocean Post line.

- 1. FILL OUT COUPON. This is the return address section of Business Roply Form
- 2. CUT OUT AD ON THE SOLID LINE to top and side of page. 2-Cut out ad an solid line."
- 3. FOLD IN HALF ON DASH LINE, marked 3-Fold in half here
- 4. FOLD IN HALF ON DOTTED LINE, marked
- 5. STAPLE OR SCOTCH TAPE CLOSED

WE WILL BE PLEASED TO SEND CATALOG TO SCHOOLS, INSTITUTIONS, BUSINESS FIRMS, ETC. Use your official address, no catalogs can be sent to private residences

OCEAN POOL SUPPLY CO., INC. 155 West 23 Street . New York 11, N. Y.

W CUT OUT AD ON SOLID LINE *

PERMIT NO. 29848 SEC. 34.9 P. L. & R. NEW YORK, N. Y.

3

4-FOLD

0 -4 844 > the Z 8 140 >

state

25.Ba

INC 00. Street, N. Y. SUPPLY WILL BE 23 West ? 155 Wes POSTAGE AN 39

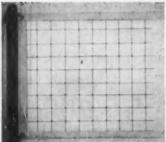
_ D = 565 06 5 M Stang MA Z W 2 m i BIG NEWS IN NETTING FROM

GOLD MEDAL

ANNOUNCING A NEW, IMPROVED

Linen Volleyball Net

Beats All Competition in Quality and Price



Note how tie strings hold the net in tension. Tougher, Stretchfree, More Durable!—
This new, standard, 32-foot volleyball net
is made of fine linen seine twine, and combines linen's blg advantages in a net that
looks better, lasts longer. It's priced low,
too—a more economical net in many ways.
Offered in two styles by both of America's
two leading lines of sports netting...

GOLD MEDAL Style #LD-3230-VBC (steel cable), and #LD-3230-VB (rope cable).

INVINCIBLE Style #LB-3230-VBC (steel cable), and #LB-3230-VB (rope cable).

See Your Nearest Dealer



"A Net for every purpose . . . a purpose for every net."

THE LINEN THREAD CO., INC.

418 GRAND STREET . PATERSON 12, N. J.

New York

hicago

Boston

San Francisco

Baltimore

Prescription FOOTBALL GOGGLES



Many a star football player is kept on the bench because of faulty vision. If he must wear glasses he may now wear protective goggles with lenses ground to his individual prescription.

PRECISION ATHLETIC GOGGLES are tailor-made for each prescription. Lenses are case-hardened in accordance with U.S. Government Safety standards.

Full vision lenses (60 mm. long x 50 mm. high) are set in molded rubber frame in proper position to afford wide-angle vision. Ventilating ports minimize fogging—Comfortable; Shockproof.

FREE BROCHURE

Price \$24.75. When ordering send name, address and prescription. Enclose remittance (Check or Money Order). Allow 6 days for delivery. FREE brochure on request.

PRECISION ATHLETIC GOGGLE CO.

Dept. 457-L

Rochelle, Illinois

FOOTBALL AT OHIO STATE

By WOODY HAYES

Complete coaching text that covers entire game exactly as it's taught at Ohio State

- Offensive Strategy
- Running Game
- Split T Series
- Power Series
- · Trapping and Draw Play
- Offensive Drills
- Forward Passing Game
- Training the Quarterback
- Ohio State Defenses
- Kicking Game
- Scouting
- Statistics
- Organization and Planning
- Athletic Injuries
- · Coach-Player Relationship

Thoroughly detailed, completely illustrated

Price \$5

WOODY HAYES

1711 Cardiff Rd., Columbus 21, O.

\$2.95. (Completely revised volume emphasizing new developments in tackle and techniques of fishing the surf.)

- The 1958 Annual Six-Man Football Magazine. Pp. 64. Illustrated. Baltimore, Md.: C. J. O'Connor. \$1. (Seasonal review, records, technical articles, new rules, etc.)
- 1958 High School Track & Field Manual. By Dick Bank. Pp. 31. Illustrated. Los Altos, Calif.: Track & Field News. \$1. (Marvelous collection of all-time best performers, all-time best by class, 1957 best performers, evolution of records, and national records.
- 1958-59 Seal O San Basketball Coaches Digest. Pp. 64. Illustrated. Huntington, Ind.: Huntington Labs. Free to coaches, 50¢ to others. (Superb collection of technical articles appearing in Scholastic Coach and other coaching magazines last year.)
- Best Sports Stories of 1958. Edited by Irving T. Marsh and Edward Ehre.
 Pp. 336. New York: E. P. Dutton & Co. \$3.95. (Finest newspaper and magazine stories of last year, together with the year's best sports photos and champions in all sports.)
- Your Swimming Pool, Its Program and Operation. Pp. 127. Illustrated. Toronto, Ontario: National Council of YMCAs of Canada, \$1. (Useful information on stunts and games, aquatic shows, diving, organization of meets, swimming for handicapped, skin and scuba diving, etc.)

Basic Six Rushing Defense

(Continued from page 70)

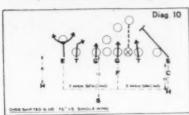
drop straight back on the snap to a maximum of 10 yards, concentrating solely on the quarterback with no attempt to cover a receiver.

Once the ball is thrown, all backs converge on the ball. The deeper playing halfbacks and safety play their normal zones, but loosen up to reduce the possibility of a receiver getting behind them.

OVERSHIFTED 6 OR "75" vs SINGLE WING: The Single Wing brings to mind the unbalanced line with backs aligned to the strong side, highlighted by a wingback positioned one yard back and outside the offensive end.

Primary strengths of the Single Wing are its concentration of power between the tackles, massing of interference on the off-tackle and end sweeps, double-team power and trap blocking in the line, deception provided by the spinner back, and maximum use of the tailback as a runner, passer, and kicker, particularly in the exercise of the run-pass option on the sweep play.

To offset the predominant strong-side strength of the Single Wing, toward which the majority of plays are directed, we employ the Overshifted 6 (two defensive men outside the end). This is tantamount to sevenman spacing on the strong side and five-man spacing on the weak side, or actually a "75" defense (Diag. 10).



The deep snap-back from center together with lateral running movement and subsequent delay in advancing ball across the line make the success of the Single Wing contingent upon ability of linemen to sustain their blocks.

Therefore, great emphasis is placed on penetration and pursuit. If the guard pulls, we want the defensive guard to follow closely to jam the

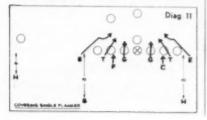
The reverse is the weak-side counter of the Single Wing; therefore, we ask the end not to chase the play but rather to penetrate, box, and hold his position.

The strong-side end plays a vital part in the defensive pattern. On the snap, we like him to charge hard into opposing wingback, executing a forearm shiver. The objective is to neutralize the wingback as a blocker and to penetrate into position to strip the interference on the sweep or to assist the tackle in breaking up the offtackle power play.

Defensive Secondary: Functions the same as illustrated for the Basic 6, where our halfback takes flank responsibility on the sweep as he sees the play develop. The other backs follow their normal rotation pattern.

AUTOMATIC 61 vs MULTIPLE FLANKERS and SPREADS: Two good reasons for employment of flankers are (1) to put pass receiver in the open, and (2) to divert defensive line strength in exploitation of running plays.

Our adjustment for this is to cover a single flanker, whether a split end or halfback set out, with our halfback, the safety then taking the strong-side end and the opposite halfback the weak-side end. Thus, our 6- or 8-man line, as the case may be, remains intact to insure maximum pressure on the passer or runner. Note Diag. 11.





EXTRA SHOULDER PROTECTION!

Top Coaches

Insist

On This Proven

SHOCK

- WEAR UNDER REGULAR SHOULDER PADS
- EXCELLENT FOR HEAVY, ABUSIVE CONTACT DESIRED BY THOSE WITH SHOULDER BRUISES
- ADJUSTS TO JUST THE RIGHT COMFORTABLE POSITION

The shoulder shock cushion consists of two pneumatic units which fit over the bony construction of each shoulder, and when worn under your regular shoulder pads, constitutes the best protection available. This pad can be used, not only for injury, but also where lightness is desired reducing the weight of the shoulder pad body. The two units may be separated, placed on different parts of the torso, and taped thereto, making a fine pneumatic bruise pad for ribs, chests, spines or hips. The only EXTRA protection available for shoulder injuries.

SEE YOUR DEALER TODAY OR WRITE DIRECT AIR PAD and BRACE CO., ELYRIA, OHIO

NEW from





100% ORLON AWARD SWEATERS

Washable! Baby Shaker and Jersey Knits!

Precise tailoring for perfect drape. Brilliant colors in long-wearing 100% High bulk Orlon that washes with the greatest of ease moth and mildew resistant. Jacket and pullover styles in all popular school colors.



SAND KNITTING MILLS CORP.

Exclusive Athletic Knitwear and Clothing BERLIN, WISCONSIN

FREE on request! Complete catalog of athletic clothing.

Fast Black and White FILM PROCESSING 7 DAYS A WEEK

930, 931, Tri-x, Plus-x Reversal, .03 ft. Reversal dupes, .06 ft. Negative, .031/2 ft. Positive, .041/2 ft. 16 mm. Mags. \$1.00

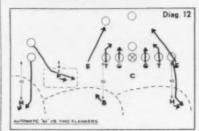
- · Continuous type, custom-built, time and temperature controlled processing equipment operated by owner personnel, assuring personal service throughout.
- Absolute 'satisfaction guaranteed.
- · Free pick-up at bus station, girport, or post office. Return transportation paid. Open accounts accepted.
- · All film treated with "Vita-Film" and returned on 400 ft. projection reels at no extra charge, and in cans ready for projection. Custom processing if requested at no additional charge.

Cine-Graphic Film Lab., Inc.

1720 Olive St., St. Louis 3, Mo. Since 1933 Ga. 1-5828

V. A. Seigrist, Pres.

When two or more flankers set out to same side, we revert to an Automatic 61 Defense-guards head over guards; tackles over tackles; ends one vard out from tackles or on outside shoulder of offensive end if this man is not split out. See Diag. 12.



We follow the following rule for flanker coverage:

1st Man Out-halfback that side

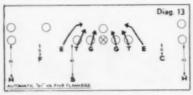
takes outside responsibility.

2nd Man Out—lineback that side takes shallow inside responsibility.

3rd Man Out-safety takes deep inside responsibility.

Diags. 11 and 12 illustrate application of the flanker rule when one and two players, respectively, are set out to one side. If the maximum number of five flankers are spread, as in Diag. 13, the first man out on each side is taken by the corresponding halfback, the second man out to each side is picked up by the linebacker to that side, and the remaining third man is covered by the safety taking deep

inside responsibility.



We cannot emphasize too strongly that our 6-man line isn't influenced by the use of multiple flankers. Prime objective of linemen is penetrating and rushing the passer, which we feel is the best pass defense.

We never tell the end to widen out with a flanker if he can penetrate before being blocked to the inside. By moving across the line of scrimmage, the end drives a wedge between the ball-carrier and his flankers, thereby isolating their effectiveness as blockers. If the offensive line spreads, our defensive men spread, but only if they cannot shoot the gap before being blocked.

Summary: Our overall defensive plan is designed to contain the ground game of the different offenses encountered. Actually, the Basic 6 and its variations function more as an 8-man line to invite the pass, thereby exerting some influence on offensive

Interestingly, here in the West, both the University of Oregon, winner of the Pacific Coast Conference, and undefeated Arizona State of Tempe presented the best rushing defense in their respective leagues last season.

SCOREBOARD?

Here's a Budget Tip



Is a scoreboard still on your checklist? Why not get a combination football and basketball board?

The big FB-33-C Fair-Play score-The big FB-33-C Fair-Play score-board above is the ultimate in versatility. Comes in two sections. Top section makes an outstand-ing basketball scoreboard when mounted on wall or suspended. Has all the basic scoring and tim-jung for cottabil. ing for football, too.

Buy the top section NOW—use it yet for this season's football; then take it into your gym for basket-ball this winter. Add bottom sec-tion for next year's football games or when your budget permits.

Write for full details

FAIR-PLAY SCOREBOARDS

BOX 359

DES MOINES, IOWA



Portable Water Bubbler . . . for All Sports

Recommended by Health Authorities and Coaches • Carries cool, safe drinking water anywhere • Streamlined Stainless Steel tank · Rubber tired wheels for easy rolling • Two modern sanitary push-button fountains for steady pressurized water flow. Easy to fill, ice, clean. Five gallon capacity.

OHC MFG. CO. Inc. BADINGER ROAD WISCONSIN



STOP WATCH REPAIRS & SERVICING Write today for new catalog showing over 50 models.

M. DUCOMMUN CO.

Specialists in Timing Instruments \$80 Fifth Ave., New York 36 . PLaza 7-2540

Oregon State's Single Wing Attack

(Continued from page 10)

fundamental position are applied to specific areas of responsibility, but the true concept of fundamental position remains the same.

Before elaborating on our system and its component parts, I might add that we believe in simplicity and perfection. In this respect, we have limited our offense to a minimum number of running plays. We feel there's a tremendous advantage in having fewer plays and concentrating on the techniques required to execute them effectively. More time can thus be devoted to the fundamentals previously mentioned.

One factor which must be considered in developing this philosophy of simplicity is incorporating enough diversity and variety. This must be done to create sufficient problems for the defense which, after all, is the criterion for the type and number of plays used by any offense. In order to accomplish this, our offense has been devised to hit every defensive hole from the same starting action.

In our system, we run as much from formation left as from formation right. This further enables us to exploit the defensive strategy of individual opponents by necessitating more preparation on their part. As a result, we designate our line as either strong-side or weak-side and have eliminated the words right and left when referring to individual positions.

WB DETERMINES STRONG SIDE

The strong-side is referred to as the side of the center on which the wing-back lines up. For example, if formation left is called, the WB would line up to the left side of center, out and back, from his offensive strongside end.

To further simplify offensive line assignments, our strong-side linemen always play on the strongside regardless of whether right or left has been called. The weak-side linemen, correspondingly, are always on the side away from the wing-back. Thus, the strong end in formation right is the right end, whereas, when formation left is called, he becomes the left end.

This eliminates the problem of learning dual assignments, but intensifies the necessity for developing blocking proficiency with both "Towers of Strength.."



- portable
- sectional
- permanent
 GRANDSTANDS
 BLEACHERS

The "tower type" construction on the Snyder all steel grandstand illustrated, insures long usage and safe seating.

Easy to install, designed so additional sections can be added, and planned for future installation of shower facilities this Snyder Steel Stand is safe, economical and practical.

If you are considering a similar installation or need help in planning, consult our engineers. They will gladly help you with your grandstand or bleacher problems.

For further information write:

SNYDER TANK CORP.

SCOREMASTER IS FIRST CHOICE FOR COACHES, REPORTERS & ANNOUNCERS





"SCOREMASTER BASKETBALL SCOREBOOK IS ACCURATE, DEPENDABLE AND BY FAR THE EASIEST BOOK I'VE EVER USED TO SCORE IN"

RICK WEAVER, Sports Director, KFH, Wichita, Kansas

No matter how fast the action or how high the score, you can keep pace with Scoremaster, A permanent record, complete in every detail. This season, score with Scoremaster Basketball Scorebook.

Buy Scoremaster Basketball and Baseball Scorebooks from your dealer



Black . Studio

"Reel" Quick Service for your

Football Game Films

Motion Picture Film
Processing and Duplicating

Black and White 16 mm. Reversal or Negative

16 mm. KODACHROME 8 mm. Reversal

7 Days a Week During the Season!

254 SOUTH FERRY ST. SCHENECTADY 5, N. Y.

Black . Studio

BARBELL

TRAINING COURSES

FREE



★ Now available from America's outstanding barbell authority. ★ Holder of 8 official AAU National Open titles. ★ Win-

titles. * Winner of more Mr. America awards than any other living athlete. DAN LURIE, famous Big Top TV strongman.

SEND TODAY FOR FREE CATALOG
OF LATEST HEALTH EQUIPMENT.
NOW AVAILABLE DIRECTLY AT LOW
FOUNDRY PRICES. LOWEST ANYWHERE.
WRITE FOR DETAILS ABOUT DAN LURIE
TRAINING PROGRAM. PLAN A PROFESSIONAL EXHIBITION NOW. A LIMITED
NUMBER OF GRATIS DEMONSTRATIONS
NOW BEING ACCEPTED FOR FALL PROGRAMMING. RESERVE NOW.
WRITE TO

DAN LURIE

DAN LURIE BARBELL CO., 50-SC9 Bristol St., Dept. 998J., Brooklyn 12, New York shoulders. To expedite and accomplish our offensive alignment, we serpentine out of the huddle when formation left is called.

For purpose of explanation, **Diag.** 1 depicts our offensive set in formation right showing our spacing, numbering system for defensive holes, and the plays run in each hole.

In numbering our plays, the last digit of the play denotes the hole being attacked. All diagrams in this article will be pictured against a standard over-shifted defense (Diag. 1)

Our basic running plays consist of four series: The teen, ninety, thirty, and forty series.

All teen plays go to the strongside and are carried on a direct snap from center by the tail-back.

The ninety series is the full-back spin series. Here the ball is snapped to the FB, and he either keeps or hands off to the wingback or the tail-back.

The forty series are tail-back plays which hit to the weak-side. It's commonly referred to as the "fake pass and run series" or the tail-back "stand up" series.

The thirty numbered plays hit from inside tackle to inside tackle and are straight bucks by the full-back.

Another component part of our basic offensive is our passing attack, which consists of three types of passes. Our "slot" or "cup" passes do not involve a fake of a run. These passes are thrown from normal dropback protection with the tail-back throwing to any one of three potential receivers. Most of these passes are of the pattern variety, but we occasionally throw to individual receivers executing a specific maneuver.

RUNNING PASS SERIES

Our running pass series is an option pass or run where the tail-back fakes a sweep and either passes or runs, depending on the reaction of the defensive secondary.

To balance our over-all attack, we also employ the moving pass series which involves faking either off-tackle or inside-tackle before the passer releases the ball.

Each particular type of pass necessitates corresponding pass protection by the interior linemen and backs protecting for the passer.

You'll notice, by once again referring to Diag. 1, that our basic line splits are approximately six inches, with the exception of the WE and WT. We split our weak-side end to 18 inches in order to facilitate his getting off the line expeditiously on pass patterns.



DAYTON RACQUET COMPANY
898 Albright St. Arcanum, Ohio

Dayton STEEL RACQUETS

AUTOMATIC IRRIGATION

"Set it and Forget it"



Inexpensive — Designed for Athletic Fields.
Waters greas up

Waters areas up to 100 x 600 ft. in one setting.
Only 10 minutes to set or removel Pulls itself along thru winding up a steel cable—Water Powered—Shuts off water

Write for information and free trial offer

TRAVELRAIN

362 N. Canon Drive, Beverly Hills, California Established 1935



Since our running offense has a variety of traps and sweeps where linemen pull, we must eliminate penetration by the defense. By operating from the tight line, our pulling linemen are able to get to the flanks quicker and adjacent blockers can also execute their retaining blocks more effectively.

IN-LINE BLOCKING

We classify our in-line blocking as either "remove" or "retaining" blocks. Remove blocks are those which are utilized at the point of attack. They consist of post and lead, geronimo, front shoulder, and reverse shoulder.

Retaining blocks are used away from the point of attack to eliminate penetration and cut off defensive pursuit. Here we use the shoulder blocks, reverse pivot, crab, and front pivot depending on where the man blocked is lined up and how he has been playing.

Offensive assignments are accomplished by utilizing zone blocking rules which are devised to adequately cover all possible defensive alignments. Space allocation for this article prohibits discussing this phase of our planning in detail.

Since it's impossible to adequately cover in detail the many phases of any offense in a brief writing, I'd like to sum up my comments by once again emphasizing the importance of fundamentals and concentration on details. No detail, regardless of how minute it may seem on the surface, should be overlooked in planning and organizing your overall program.

BASIC PRINCIPLES

Coaching demands and necessitates the development of a sense of values as they exist in football, an understanding of the principles of sound strategy and tactics, and a capacity for reasoning.

Sound coaching doesn't consist of hunches, guesses, or inspirations of the moment. It's based on logical, methodical, calculated, consistent, and intelligent planning which covers every aspect of the game and its affiliated details.

It's not simply a matter of ability to teach, but rather an application of sound principles which are established by football history and experience. The relative probabilities of what can, what might, and what will happen must be considered.

With these objectives in mind, our coaching philosophy and methodology is thus established at Oregon State.

"The best floor I ever played on!"

. . . When a basketball coach-player says that of Robbins IRONBOUND* CONTINUOUS STRIP* gym flooring

YOU KNOW IT'S GOOD!

Ask any basketball coach or player who has ever played on a Robbins !RONBOUND CONTINUOUS STRIP Maple Gym Floor what a difference it makes! Robbins floors save wear and tear on legs...there are no more complaints of sore calves, ankles, feet. There's controlled resiliency for fast, lively action guaranteed by the way Robbins flooring is laid: a layer of mastic over cement, a the way Robbins flooring is laid: a layer of mastic over cement, a layer of cork, another layer of mastic and then Robbins IRON-BOUND CONTINUOUS STRIP Maple flooring. Leroy Brandt, Principal of Middletown Community High School, Middletown, Ill., himself a player-coach, writes of the school's Robbins floor: "I feel this floor is the best I ever played on. I am really happy to have this flooring in our gym." With Robbins you get a better playing surface... permanent smoothness....longer life...lower maintenance cost.

Yet. Robbins India Jayou Costs as a page.

Yet, Robbins Ironbound costs no more.

For Your Protection . . .

Only authorized contractors install Rob-

BOUND CON-TINUOUS STRIP flooring. For de-tails and name of your nearest contractor write Dept. S-456 Reed City, Mich.

MILLIONS WALK DAILY OW ROBBINS FLOORING

FLOORING COMPANY

World's Largest Manufacturer of Maple Flooring Reed City, Michigan . Ishpeming, Michigan

*Trade-mark Reg. U. S. Pat. Off,

The Best In Performance and Visibility SCOREMASTER ELECTRIC SCOREBOARDS

Model 1250-2

Dimensions

Board 8' 4" x 18' 4" Numbergrams 12" x 18 Symbols 18" x 12" Letters 12" High



Nationally famous for modern design, this board brings color dynamics to your field. Brilliant numbergrams on red background (balance of board stadium green) flash time left to play in seconds and minutes. Brilliant football symbols show possession of ball. Timing mechanism completely automatic; can be stopped instantly for time-outs. May be set for any length period and rapidly reset at any time. Entire board controlled by compact, easy-to-operate control panel located at any convenient point. All steel construction, baked enamel finish. Write for complete information on all scoreboards and the new Sportsmaster

ALSO DIAL TIMER MODELS



M. D. BROWN CO. 2215 LAKE ST. NILES, MICH.

"When Split-Seconds Count - Count on Scoremaster"

"Tuffy" were con-FOAM-FILLED PADS FOR FOOTBALL BLOCKING MACHINES

Standard pads fit Crowther machine, but can be made to order to fit any machine you may have.

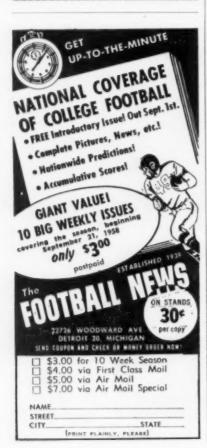
OUTSTANDING FEATURES

- · 3" thick foam-filled.
- · Heavy canvas-covered.
- · Absorbs hardest blows, won't separate or crumble.
- · Lightweight yet durable, eliminates expensive yearly replacements.
- · Keeps metal sled arms completely covered.
- Makes blocking a pleasure to learn by eliminating injuries.

School Price: \$45 per pair Immediate Delivery

TUFFY PAD CO.

305 Grove Avenue Cuyahoga Falls. Ohio

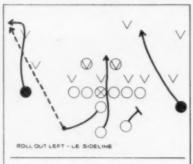


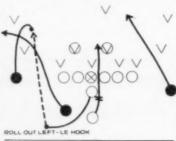
Stanford's Passing

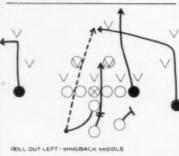
(Continued from page 14)

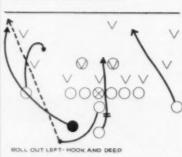
through the safety man's territory. Now on our roll-out left-wingback (flanker) middle, we send the right end to knock out the safety; the left end pulls the halfback to the sideline, and the wingback cuts into the hole!

5. 39 End Run Series (Diag. 11): Our passer starts right down the line and keeps the defensive end in tight to give our set halfback (RHB) a good blocking shot at the defensive end. Our flanker takes the defensive halfback deep, our right end goes down about eight and runs a sideline. We want to get a two-on-one on the de-









Diag. 10, "Roll-Out Series"

SCOUTING TO WIN IN FOOTBALL

Takes all the guesswork out of coaching . . . written for coaches and players . . . detailed, complete, thorough, beautifully organized.

INCLUDES:

- · Pre-game information on weather, field, location, specialists.
- · Personnel lineups and comments and ratings of each individual.
- Kick-offs and receiving charts.
- Offense analysis, game performances of individuals, offensive player position charts, book of plays.
- · Summary of defensive formations, defensive line by downs, defensive spacing charts, analysis of defenses.
- · Special suggestions on how to meet and play various defenses.

Price: \$3

Charts for Scouting to Win in Football, \$1.

College Graphic Arts Press

P. O. Box 922 Silver City, N. M.

Express Speed Service FILM DEVELOPMENT

Black and White or Color FOOTBALL BASKETBALL SPORTS, BAND, HOMECOMING

The complete "ground the clock" motion picture service you want and need no matter where you are located. You get film, development, splicing, mounting on reels and cans ready for projection and fast speedy return all at one low price. Write today for price list #59 for complete details, or telephone Bob Roush-ESterbrook 9-2860.

A-V MOTION PICTURE SERVICE P. O. Box 5608, Chicago 80, Illinois



BASKETBALL STEEL CHAIN NETS :

outdoors or indoors Also Featuring Jayfro's Custom Built

MYLON BASKETBALL NETS & BALL CARRIERS ALUMINUM MULTI-PURPOSE STANDARDS
FORTHERBALL POLES & PADDLE SETS
FALUMINUM SHUFFLEBOARD SETS MALUMINUM BATTING TEES

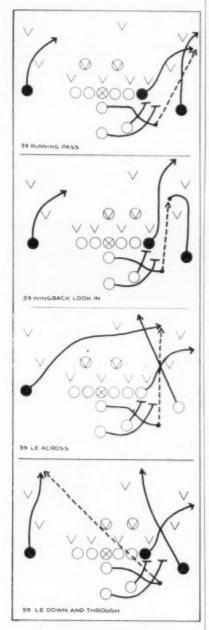
Send for Free Catalog

JAYFRO ATHLETIC SUPPLY CO. Dept. S, Box 1065, NEW LONDON, CONN.

fensive halfback; that is, one behind and one in front. Our fullback leads the passer around.

If the soft man goes back to cover the flat or shallow as our Right End breaks to the sideline, our passer will call "GO" and become a runner with the full leading. If the soft man comes up to contain the threatening run or pass, the right end is open. We haven't had a line-backer cover our right end vet!

We want to catch the safety man sneaking over to cover the flanker in order to release the defensive half to cover the right end as the defense rotates. We then call our wingback look-in. We get them playing the flanker for the down and out and then send the flanker down; he then fakes



Diag. 11, "39 End Run Series"

PERFECT FOR AL **SPORTING ACTIVITIES**

The lowest-priced 100% self contained transistorized power megaphone on the

Whether it be a track meet . . . football practice...or a normal gym class, let the Guest Chief do the work for you. Push-pull power transistors in a special circuit provide maximum speech intelligibility. The transistor circuit offers real power with low battery drain and

light weight plus durability.

Guest has been the pioneer in the power megaphone field since the announcement of the "Commander" several years ago. Then the "Thunderbird." Now it's the "Chief", the newest, advanced design power megaphone available.

Special Features: Unbreakable vinyl and polyethylene plastics for long life • material and finishes suitable for continuous outdoor use • standard batteries . battery life double of previous megaphones • change battery once a year in only a minute's time • attractive red and gray molded finish . durable plastic sling strap.

PRODUCTS CORPORATION
35-04 30th St., Long Island City, N. Y.

Fully Guaranteed For 6 Months against defects Retails for (Batteries Inc.)



Roller Skating Session - Our Lady of Lourdes H. S., Marinette, Wi-

1 out of 4 Schools' Now Do!

\$13,000 net from roller skating! That's how this school helped finance its new gym and more than paid the cost of its floor the very first year! Soft, dead flooring which false economy sometimes substitutes can't take skating, of course. For maximum liveliness with wear, make your floor Wells' DIAMOND HARD Northern Maple too.

For More on Money-making Gyms, write-

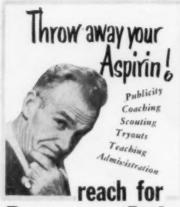


NORTHERN MAPLE and OAK FLOORING

J. W. WELLS LUMBER COMPANY

Menominee, Michigan Phone: UNion 3-9281

DISTRIBUTORS IN MAJOR CITIES COAST-TO-COAST



NOTHING-BUT NOTHING-builds stronger teams and better programs than Program Aids. The sure way to Scientific Coaching, More Wins, Increased Game Attendance, New Prestige,

- . PLAYMASTER . Coaching Aids
- RECORD-MASTER "Hall-of-fome" Displays
- **ERASO*** Posters & Charts
- SCORE-KING' Magnetic Scoreboard
- SPOT AWARDS' Trophies & Cups
 SPOT AWARDS' Trophies & Cups
 WRITE FOR CATALOG TO --

THE PROGRAM AIDS CO., INC.

The "LYBECK"

Shoulder Harness Positive Protection for DISLOCATIONS—SEPARATIONS



Fully Adjustable Right or Left Arm All Leather Construction 32"-42" Medium

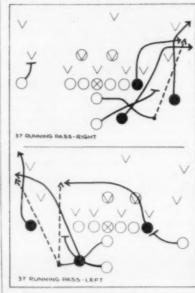
GATES SPORT SUPPLY 119-121 3rd Ave. N.E. IOWA INDEPENDENCE

44"-50"

out and breaks in "looking-in" to the center of the field.

This builds up our left end across. We send the flanker down and through on the safety man. The right end runs his down and sideline, and the left end goes down about 12 yards and breaks across the middle.

The cue we're looking for on this one is the defensive right halfback who starts playing our crossing left end tight-breathing down his neck. We play along with him and then call our left end down and through. The end runs what looks to be the same pattern, then fakes across but pours on the steam and runs for the goal post.



Diag. 12, "37 Running Pass"

6. 37 Running Pass (Diag. 11): This is a quicker-thrown pass than the 39 series with the set halfback and the fullback exchanging blocking assignments. If it's called into the flankered side, we flood that side of the field with three receivers. If called away from the flankered side, we still get a two-on-one in most cases, as most of our opponents have rotated or shifted to meet strength with strength or numbers with numbers.

Again the pressure is put on the soft man (defensive man playing our flanker) if the play is called to the flankered side. The flanker goes down and deep, the right end runs a down and sideline as the set halfback runs right at the end and makes it look like the 39 end run pattern, while the fullback takes the end man as he did on the 37 hook series. If the soft man retreats, the passer runs; if he comes, the passer tosses the soft lob to the set half going flat.

Now, going away from the flankered side, we still get the three receivers by bringing the right end across,

throwing behind the rotation with the flow of the play. Fullback is blocking the end man, the set half goes flat, and the left end runs a down and



"Jim-Flex" mats are filled with 100% safe, hair layerfelt. Excellent cushioning qualities. Triple knotted tufting with double strong cord. Heavy duty handles. You'll be surprised at the downright low cost of "Jim-Flex" mats... our top quality line!

LOW BUDGET "Standard" mats, filled with high quality, resilient felt . . . 100% safe and needle-free . . . con save you even more maney!

Write today for complete information about National mats, including goat hair, new rubberized curled hair, vinyl plastic heat-sealed seamed mat covers, and ac-cessories . . . and "Mat-Hide", the new scientific, tough, smooth-coated covering for mats in ivory, blue, green, red and grey. Also heavy white duck.

. National mats come in all sizes direct-from-factory at LOW, MONEY-SAVING PRICES!

NATIONAL

Fond du Lac, Wisconsi



"SIX-MAN FOOTBALL MAGAZINE

IS THE BEST AND MOST COMPLETE MAGAZINE OR BOOK I HAVE FOUND ON SIX-MAN FOOTBALL."

Write For Free Folder

C. J. O'CONNOR

Boys' Latin School Baltimore 1, Md.

TREAT INJURIES! WITH PORTABLE

NON-ELECTRIC WHIRLPOOL

BATH

Treat sprains, stiffness, sere muscles and other conditions requiring moiat heat and massage. Set up in shower area (Illus.) or bath tub. Recommended by coaches, Trainers, dectors. Unconditionally guaranteed.



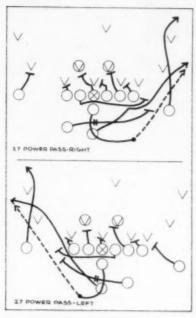
If not available at your Sporting Goods Supply Store, write for 10 day free trial, or literature.



LAURENS LABORATORIES Dept. SC, 1801 Eutaw Place, Baltimore 17, Md.

Large

deep or a down and out. We look for the right end crossing into the territory behind the right defensive linebacker.



Diag. 13, "27 Power Pass"

7. 27 Power Pass (Diag. 13): This is the same as our off-tackle power play. The quarterback reverse-pivots as the guard pulls to the side of the play. The quarterback fakes the hand-off to the left half, as the fullback goes out and feints a block at the end then slips into the flat, as the end goes on a down and out.

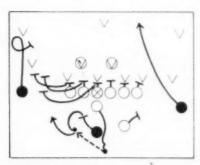
This pattern is also run into or away from the flanker. The left halfback must be alert, as sometimes the crashing end will floor our fullback; the half then continues into the flat to become a receiver.

Special Plays:

The purpose of such plays are twofold: (1) to catch the defense off balance and go all the way; (2) to keep the defenses honest. Thus we look upon the screen and the 30 late or draw as special plays that contribute to the effectiveness of our passing and running offense.

passing and running offense.

1. Screen Pass (Diag. 14): Our



Diag. 14, "Fullback Screen Left"

TOPFLIGHT PERFORMANCE VAULTING JUMPING STANDARDS STARTING BLOCKS ALUMINUM TRACK EQUIPMENT ALUMINUM ATHLETIC EQUIPMENT CO.

BOX 145, WYNNEWOOD, PENNSYLVANIA

NOW! For Football Fields! Florline Marking Machine Rolls Lines on Grass at Walking Speed

- Uses paint instead of powder
- Overcomes troublesome weather problems
- Gives greater line visibility
- Cuts maintenance
- · All-round year-round marking machine

EXCELS ON GRASS, ASPHALT, CEMENT . . . FOR FOOTBALL, PARKING, SAFETY, GAME COURT LINES!

Painted grass stands out sharp and bright, can't blur. Paint can be applied in any weather . . . wet, dry or windy. Blades of grass are painted with a surprisingly small amount of low-cost liquid athletic paint, lines can't shift or be obscured.

ROLLS ON PARKING LINES AND SAFETY WALKS!

Used for parking lines, Florline Roll-On often increases available space for cars by 30% over random parking. Makes lines 20 times faster than hand marking. Operates on gravity feed. Portable, easy to clean, store.

ROLLS LINES ON HARD-SURFACED GAME COURTS!

Lines in 4", 3" or 2" widths. Only simple change of roller and follower-brush required. Specify line width desired. Additional widths \$8 each. Florline is the accepted leader in marking machines for industry, municipalities, schools.

1½ gal. size \$132.50 • F.O.B. New Hudson • 5 gal. size \$167.50

H. C. SWEET COMPANY
POST OFFICE BUILDING NEW HUDSON, MICHIGAN



If you are looking for spectator seating to fit a limited budget, Hussey's new economy Model 10 is your answer.

These are steel frame stands with strong, smooth seat and footboards of Douglas Fir. They are extra comfortable, too

Wide 24 inch spacing between the rows gives ample knee room and the seating comfort you find in a conventional straight chair. There is more room for spectator passage along the rows. All seatboard edges are rounded.

Model 10 is engineered to stand up

under hard usage and is backed by the Hussey guarantee of quality. Each stand is mounted on 2' x 6' skids at 6' intervals so that position of stand can be changed if required.

Model 10's are available in any length and from 2 to 20 tiers high. Remember additional seating means additional income.

Write for FREE Hussey Seating Catalog showing various models.



HUSSEY MFG. CO., INC., 581 Railroad Ave., NORTH BERWICK, MAINE

Also manufacturers of ROLL-OUT Gym Seats

(FORMERLY WHITEX) THE SAFE COMPOU

NO LIME BURNS OR EYE INJURIES

Marking playing fields with lime is a dangerous procedure. Why risk body burns, irritation or eye injuries? Use "WHITELINE" . . . does not contain any free lime or alkali and is perfectly safe.

Not only are burns eliminated but "WHITELINE" will not dissolve in the rain as quickly as lime and will maintain a clear mark when used either wet or dry.

HERE ARE A FEW OF THE MANY "WHITELINE" USERS:

ALFRED . BETHANY-PENIEL . CLARKSON . COLUMBIA C.C.N.Y. . CONNECTICUT . DARTMOUTH . HOFSTRA HOWARD . MEMPHIS STATE . OHIO WESLEYAN . PURDUE UNION . UPSALA . VASSAR . VERMONT . WEST POINT

Write for complete information and sample



53 PARK PLACE, NEW YORK 7. PLANT-WAREHOUSE: JERSEY CITY

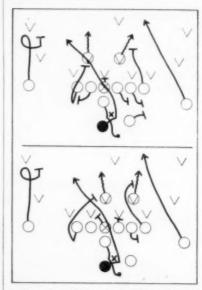






screen passes can be run off every pass pattern we have. We designate to which side we'll screen by calling "Screen Right" or "Left" and indicate who we'll screen to by calling the position - Fullback, Halfback, Left End, etc.

If it's a screen to the left, the left tackle and guard and whoever is going to receive the pass are the men involved. The men away from the side of the screen block solid until the ball is thrown. One thing we insist on is that the passer come back to his normal passing area in an orderly retreat and not abandon ship unless he's forced out of his passing spot.



Diag. 15, "30 Late Running Play"

2. 30 Late (Diag. 15): With our 30 late passing series, this running play is essential to the offense. We run it enough times to force the linebacker to respect it and thus open up the middle passing zone area.

In summary, this pass offense can be increased or reduced depending upon personnel and team maturity. The main point to remember, however, is that a well-balanced air and ground attack from a Flankered T is a most effective way to move that ball and to keep the game lively.

To me, the Run and Pass is football and should be used as one. I'll always use both phases of the game together to go for that golden line at the end of the field. To disregard one or the other is not to utilize the best of what the game has to offer.

DURING the 1946 Army-Notre Dame scoreless tie, Arnold Tucker, Cadet safety man, intercepted three of Johnny Lujack's aerials.

On the train coming home, the Notre Dame coach, Frank Leahy, drew his quarterback aside.

"Tell me, John, why did you throw

so many passes to Tucker?"
"Coach," the quick-witted quarter-back snapped, "he was the only man I could ever find open."

MASTER COUPON

KRETSCHMER (58)

in parentheses denote pag may be found. Please refe checking list. Mail coup Advertising Dept., 33 West	e on which advertisement or to advertisement before on to Scholastic Coach,	Information on Lybeck Shoulder Marness GENERAL ATHLETIC (66) Information on Basket-	Booklet, "Suggested Ways of Feeding Wheat Germ to Athletes in Training" LINEN THREAD (76)
AA100 HEG (74)	CURVETAL CO. (RE)	ball Uniforms	Catalog of Gold Medal
AALCO MFG. (74)	CHRYSTAL CO. (86)	0500014 MADDIE 1/51	Nets for All Sports
Catalog of Complete	☐ Information and Sample	GEORGIA MARBLE (65)	
Sports Line	of "Whiteline" Marking Compound for Athletic	Sample and Information	LURIE BARBELL (80)
AIR PAD & BRACE (61, 77)	Fields	on Plus 5 White Line Marker	Catalog of Barbell Equip.
Catalog on Heavy-Duty		Marker	MAGGIE MAGNETIC (2)
Knee Brace, Adjustable	CINE-GRAPHIC FILM (78)	GUEST PRODUCTS (83)	Information on Football,
Ankle Brace, Shoulder	☐ Information on Fast Film	Information on Transis-	Basketball and Baseball
Pad	Processing	torized Power Mega-	Magnetic Diagram Boards
ALUMINUM ATHLETIC (85)	CINE-O-TONE (74)	phone	
☐ Brochure on Hurdles,	☐ Information on Speedy		MASTER LOCK (62)
Crossbar, Standards	Film Processing	H. & R. MFG. CO. (74)	Catalog on Control Key
Vaulting Poles		Booklet on Dry Line Markers for All Sports	Combination Padlocks
AMERICAN BLAVEROUND	COLLEGE GRAHP. ARTS (82)	markers for All Sports	MILL-MONT (34)
AMERICAN PLAYGROUND DEVICE (30)	☐ Folder on Scouting Charts	HARVARD TAB. TENNIS (51)	☐ Information on Protec-
	COSOM (33)	☐ Table Tennis Tournament	tive Mouthguards
Catalog of Dressing Room Equipment	☐ Diagrams of 101	Kit	NADEN (66)
Catalog of Playground	"Scoop" Games		Electric Scoreboards
Equipment	AVAI AVIIED 1 DV 1451	HILLYARD CHEMICAL (4)	and Timers
Catalog of Pool Equip-	CYCLOTHERAPY (45)	Specifications Sheet on	Baseball Catalog
ment	Catalog of Cyclo-Massage	Trophy Gym Finish	Basketball Catalog
AMERICAN WIRE (88)	Equipment	HODGMAN RUBBER (53)	Football Catalog
Folder on Locker Baskets	DAYTON RACQUET (80)	Catalog on Sideline	NATIONAL SPORTS (84)
and Uniform Hanger	Rules and Court Layouts	Parkas, Hooded Capes,	Price Circular on Jim-Flex
	for Tennis and Badminton	Warm-Up Jackets, etc.	Gym Mats
AUSTIN FENCE (52)	DENISON, ORTHOP'DIC (58)		Circular on Floor and
Catalog on Athletic Field	☐ Information on Shoulder	HUNTINGTON LABS, (27)	Wall Mats and Covers,
and Gym Equipment	Vest	Folder, "The Key to Gym	Baseball Bases
A-V MOTION PICTURE		Floor Finishing"	NEW EQUIPMENT (46, 48)
SERVICE (82)	DUCOMMUN, M. (78)	Manual, "How to Sweep and Mop Floors"	Complete information on
☐ Information on Speedy	Catalog of Complete	and mop rious	Gym Seat Locking Device
Film Processing	Line of Stop Watches	HUSSEY MFG. (86)	Low-Cost Floodlight
DECTAL DISVINION	DU PONT (36, 37)	☐ Illustrated Seating	All-weather Band Parka Electric Megaphone
BECTON, DICKINSON	Data on High Speed	Catalog	Stadium Seat
(Inside Back Cover)	Motion Picture Film		Padded Wainscot
☐ Manual on Prevention	EARLVILLE BLEACHER (88)	IMPERIAL KNITTING (40)	Leather Conditioner
and Treatment of Athletic Injuries	Details on Bleachers	☐ Information on Award	Anti-Fungal Spray
Americ Injuries	Details on bleachers	Sweaters	Portable Megaphone Portable Scoreboard
BEHRENS MFG. (78)	EASTMAN KODAK (43)	IVORY SYSTEM	Oval Trampoline Tubing
☐ Information on Portable	Literature on Movie	(Back Cover)	Target Butts
Water Carrier	Equipment and Supplies,	Monthly Bulletin,	NISSEN TRAMPOLINE (23)
BERLIN CHAPMAN (74)	and Processing Labs.	"The Observer"	The second secon
☐ Information on Ez-A-Way	FAIR PLAY (78)		Complete Trampoline Training Kit
Folding Bleachers	☐ Information on Electric	JAYFRO ATH. SUPPLY (82)	
rotating bleatiners	Basketball Scareboards	Catalog on	NURRE COS. (73)
BLACK STUDIO (80)	FEATHERLAX (55)	Steel Chain Nets	Booklet on All-Glass
☐ Information on Rapid		Tetherball Sets	Banks
Game Film Processing	Information on Feather- bite Protective Mouth-	Aluminum Standards	OCEAN POOL (75)
BRANIEV WASHETH IN	piece	JENNISON-WRIGHT (29)	Catalog on Swim and
BRADLEY WASHFTN. (50)			Pool Equipment
Catalog on Multi-Stall Showers and Wash-	FENNER-HAMILTON (61)	☐ Information on Kreolite Flexible Strip End Grain	OHIO ATH, SPECIALTY
fountains	Catalog on Gym-Master	Wood Block Flooring	(55, 71)
	Line of Trampolins		Information on
BROWN, M. D. (81)	FILM-LABS. (47)	KING-O'SHEA (56)	Football Speed Cleat
Catalog of Scoremaster	Brochure and Mailing Kit	☐ Information on Custom-	Football Face Bar
Electric Scoreboards	for Motion Picture Film	Built Basketball Uniforms	Football Practice Pants

BASKETS LOCKER

SPACE SAVING UNIFORM HANGERS





All weided steel wire, Molten Metal dipped (tin alloy) after fabrication to insure maximum corroson resistance, Available in sizes to meet your lock-er room needs. Write for descriptive literature and school prices.

Filling YOUR Seating Needs . . .

to your best advantage. That's our job. We enjoy it. And we have the Earlville line of bleachers and grandstands to do it well.

Want help in planning, with no obligation? Write Dept. A . . .



AMERICAN WIRE FORM CORP. 267-273 Grant Ave. Jersey City, New Jersey

MASTER COUPON

(See page 87 for other listings) (Numbers in parentheses denote page

on which advertisement may be found) PENNA. ATH. PROD. (15) ROBBINS FLOORING (81) UNION METAL (67) Literature on Rubber-Information on Iron-Catalog on Monotube Covered Footballs bound Continuous Strip Floodlighting Poles Maple Gym Floors PLAYTIME EQUIP. (26) U. S. RUBBER, ENSOLITE (1) Literature on Steel SAFWAY STEEL (71) ☐ Information on Ensolite Bleachers Bulletin on Safway Portable Steel Bleachers Protective Athletic POWERS MFG. (62) Catalog on Uniforms SAND KNITTING (77) U. S. RUBBER, FIBERTHIN for All Sports Complete Catalog of (49)PRECISION GOGGLE (76) Athletic Clothing Sample Folder of Brochure on Non-Fiberthin SCOREMASTER (79) Shattering Athletic ☐ Information on Basket-Goggles UNIVERSAL BLEACHER (80) ball and Baseball Catalog on Portable PROGRAM AIDS (84) Scorebooks Wood and Steel Bleachers Full Color Catalog on SICO MFG. (64) Playmaster Coaching Aids UNIV. ATH. EQUIP. (75) Folder on Tuck-Away Table Tennis Unit Record-Master Hall-of-Literature on Uniform Fame Displays Hangers and Ground Eraso Posters and Charts SIX-MAN FOOT, MAG. (84) Plugs (for marking fields) Score-King Magnetic Folder Scoreboard WELLS LUMBER (83) Spot Awards Trophies SNYDER TANK (79) ☐ Information on Northern Maple for Gym Floors and Cups ☐ Information on All-Steel Grandstands **RAWLINGS (3)** WESTERN CINE SERV. (41) Catalog of Basketball SPALDING & BROS. (35) ☐ Information on Speedy Equipment Catalog Film Processing REMINGTON ARMS (57) SWEET, H. C. (85) Literature on WHIRL-A-BATH (84) ☐ Information on Florline Organizing a Rifle Club Marking Machine 10-day Free Trial of Non-**Building a Range** Electric Whirlpool Bath Operating a Club TRAVELRAIN (80) Unit Literature on Automatic Literature on Non-Electric RICHARDS-WILCOX (63) Power Sprinkler Whirlpool Bath Unit Catalog on FoldeR-Way TUFFY PAD (82) **Folding Partitions** WIGWAM MILLS (22) Information on Pads for RIDDELL JOHN T. Information on Nywool Athletic Socks **Blocking Machines** (Inside Front Cover) UniMAC (59) Information on Quality WILSON (6) Line of Football Equip-☐ Information on School ment Laundry Equipment Catalog POSITION (Principal, coach, athletic director, physical director) SCHOOL ENROLLMENT ADDRESS CITY ZONE STATE

No coupon honored unless position is stated

September, 1958

ADVERTISERS INDEX

A-V MOTION PICTURE SERVICE

AALCO MANUFACTURING COMPANY AIR PAD & BRACE COMPANY ALUMINUM ATHLETIC EQUIPMENT COMPANY AMERICAN PLAYGROUND DEVICE COMPANY AMERICAN WIRE FORM CORPORATION AUSTIN FENCE COMPANY, INC.	32
BECTON, DICKINSON & COMPANY 3rd Co BEHRENS MANUFACTURING COMPANY BERLIN CHAPMAN COMPANY BLACK STUDIO, INC. BRADLEY WASHFOUNTAIN COMPANY BROWN, M. D., COMPANY	78 74 80 50 81
COLLEGE GRAPHIC ARTS PRESS CONVERSE RUBBER COMPANY COSOM INDUSTRIES, INC. CYCLOTHERAPY, INC.	86 78 74 82 21 33 45
DATION RACQUET COMPANY DENISON, C. D., ORTHOPAEDIC APPLIANCE CORP. DUCOMMUN, M., COMPANY DU PONT, E. I., DE NEMOURS & COMPANY 36,	58 78 37
EARLVILLE BLEACHER CORPORATION EASTMAN KODAK COMPANY	88 43
FAIR PLAY MANUFACTURING COMPANY FEATHERLAX CORPORATION FENNER-HAMILTON COMPANY FOOTBALL NEWS, THE FILM-LABS, INC.	78 55 61 82 47
GATES SPORT SUPPLY GENERAL ATHLETIC PRODUCTS COMPANY GEORGIA MARBLE COMPANY GUEST PRODUCTS CORPORATION	83
H. & R. MANUFACTURING COMPANY HARVARD TABLE TENNIS COMPANY HALVARD CHEMICAL COMPANY HOLLYARD CHEMICAL COMPANY HODOMAN RUBEER COMPANY HOOD RUBBER COMPANY HOOD RUBBER COMPANY HUNTINGTON LABORATORIES, INC. HUSSEY MANUFACTURING COMPANY	74 51 76 4 53 39 27 86
IMPERIAL KNITTING COMPANY	40 ver
JAYFRO ATHLETIC SUPPLY COMPANY JENNISON-WRIGHT CORPORATION	82 29
KING-O'SHEA KRETSCHMER CORPORATION	56 58
LAURENS LABORATORIES LINEN THREAD COMPANY, INC. LURIE, DAN, BARBELL COMPANY	84 76 80
MucGREGOR COMPANY, THE MAGGIE MAGNETIC, INC. MASTER LOCK COMPANY MILL-MONT COMPANY	19 2 62 34
NADEN INDUSTRIES NATIONAL SPORTS COMPANY NISSEN TRAMPOLINE COMPANY NURRE COMPANIES, INC.	84 23 73
OCEAN POOL SUPPLY COMPANY OHIO ATHLETIC SPECIALTY COMPANY 55,	75 71
PENNSYLVANIA ATHLETIC PRODUCTS DIV. OF THE GENERAL TIRE & RUBBER COMPANY PLAYTIME EQUIPMENT CORPORATION POWERS MANUFACTURING COMPANY PROGRAM AIDS COMPANY, INC. RAWLINGS SPORTING GOODS COMPANY REMINGTON ARMS COMPANY, INC. REMINGTON ARMS COMPANY, INC. REMINGTON ARMS COMPANY, INC. COMPANY	15 26 62 76 84 3 57
SAFWAY STEEL PRODUCTS, INC. SAND KNITTING MILLS CORPORATION SCOREMASTER COMPANY SEAMLESS RUBBER COMPANY SICO MANUFACTURING COMPANY, INC. SIX-MAN FOOTBALL MAGAZINE SIX-MAN FOOTBALL SIX-MAN FOO	77 79 25 64 84 79 35 85
TRAVELRAIN POWER SPRINKLER COMPANY TUFFY PAD COMPANY	80 82
UNIMAC COMPANY UNION METAL MANUFACTURING COMPANY UNITED STATES RUBBER COMPANY 1, 31, UNIVERSAL BLEACHER COMPANY UNIVERSITY ATHLETIC EQUIPMENT COMPANY	59 67 49 80 75
WELLS, J. W., LUMBER COMPANY WESTERN CINE SERVICE, INC. WIGWAM MILLS, INC. WILSON SPORTING GOODS COMPANY	83 41 22 6

the ACE team

has plenty of support

For treating injuries to muscles or joints, ACE products provide the right combination of support and pressure.

ACE Rubber Elastic Bandage

is made with controlled elasticity for controlled pressure, balanced weave for constant body. Over 35 years of manufacturing experience are behind this long-lasting, consistently reliable bandage.



ACE-HESIVE Elastic Adhesive Bandage

combines the elasticity and support of famous B-D quality cotton elastic with the added strength and holding properties of a specially developed adhesive backing.

and now...
a new reinforcement
joins the line-up

ACE Adherent (Aerosol)

Sprayed on affected areas before bandaging, it prevents slipping of adhesive tape, bandages and dressings...reduces or eliminates allergic skin reactions.

The convenient aerosol container saves loss through evaporation and residue waste—is so easy to handle!



BECTON, DICKINSON AND COMPANY

RUTHERFORD, N. J.



D.D. ACE ARE ACE MESTIVE, T.M. DEG. M.S. DAT. OFF

READY FOR KICK-OFF

All football equipment sent to the IVORY SYSTEM has been expertly reconditioned and delivered ON TIME

NOW

Take advantage of Ivory System's fast, dependable emergency service to keep this equipment in top condition.

SOLE DISTRIBUTORS

IVOR-SAN

Offers positive protection against athlete's foot in shoes and locker room

DAWHIDE

Longest wearing and toughest lacing material ever made for athletic shoes We welcome an opportunity to prove our unsurpassed service and expert workmanship.

The IVORY SYSTEM inc.